If found, please return to

THE LIBRARY
MAGDALEN COLLEGE
OXFORD OX1 4AU

80 P 11

336.3
HAR
(RES.)

THE PROPERTY
OF THE
HISTORY LIBRARY
MAGDALEN COLLEGE

OXFORD SHELF 71.

History Library
Magdalen College

WITHDRAWN
From Magdalen College Library

3069862887

THE NATIONAL DEBT

THE
NATIONAL DEBT

BY

E. L. HARGREAVES, M.A., Ph.D.(Econ.)

FELLOW OF ORIEL COLLEGE, OXFORD

LONDON
EDWARD ARNOLD & CO.
1930

[*All rights reserved*]

MAGDALEN COLLEGE LIBRARY

Made and Printed in Great Britain by
Butler & Tanner Ltd., Frome and London

PREFACE

I have dealt with the history of the National Debt as a continuous development extending over very nearly two hundred and forty years, and I have not been primarily concerned with the theory of public indebtedness as expounded in works on public finance. Even in Chapter V my intention has been to consider the attitude of eighteenth-century writers towards current financial problems rather than to discuss general financial theory.

My thanks are due in particular to Professor Cannan, who kindly read the greater part of the manuscript of the book and made many valuable suggestions and criticisms.

E. L. HARGREAVES.

ORIEL COLLEGE,
OXFORD.
July, 1930.

CONTENTS

CHAP. PAGE
I THE ORIGIN OF THE DEBT 1
II THE SINKING FUND 22
III CONSOLIDATION. THE ORIGIN OF THE STOCKS . . 47
IV THE SEVEN YEARS WAR AND THE WAR OF INDEPENDENCE 60
V EIGHTEENTH-CENTURY VIEWS ON THE DEBT . . . 73
VI THE REVIVAL OF THE SINKING FUND 91
VII THE WAR WITH FRANCE—I 108
VIII THE WAR WITH FRANCE—II 123
IX THE ABANDONMENT OF THE SINKING FUND . . . 135
X 1830–60 157
XI TERMINABLE ANNUITIES 175
XII TWO AND A HALF PER CENT. 203
XIII WAR AND POST-WAR BORROWINGS 230
XIV THE PROBLEM OF REPAYMENT 263
TABLES 291
BIBLIOGRAPHY 297
INDEX 301

Note.—In the footnotes the abbreviation P.I. & E. refers to Public Income and Expenditure: *Parliamentary Papers*, 1868–9, XXXV.

THE NATIONAL DEBT

CHAPTER I

THE ORIGIN OF THE DEBT

In the fifth book of the *Wealth of Nations* Adam Smith has provided a clear account of the origin and development of the different forms of public indebtedness. He has shown how at the outset loans were raised without the pledging of particular sources of revenue to the payment of interest and the repayment of principal; how subsequently there developed the practice of mortgaging particular "funds" for limited periods of time until the principal of the loan should be repaid; and how finally these "funds" came to be mortgaged in perpetuity.

The origin of the public debt of Great Britain lies in the practice of borrowing upon the security of particular taxes granted by Parliament, a practice which developed after 1660, but only came to be systematized after the Revolution of 1688. The term "funds," which was subsequently used with reference to the public securities themselves, at first meant the taxes thus pledged.[1] Thus the rise of the "funding system" has both a political and a financial significance. In its political aspect the system was definitely bound up with the Parliamentary control of finance. Hitherto Parliamentary control of public borrowing had been intermittent and ineffective. But under the arrangements which prevailed after the Revolution, Parliamentary authority was regularly required both for the raising of loans and for the imposition of the taxes and duties to meet the interest on and the repayment of the sums lent. Financially the system involved the creation of debt possessing some degree of permanence. Borrowing which was nothing more than an anticipation of the produce of certain duties, even though these duties were pledged, never appears to have been described as funding.[1] The quality of permanence probably serves better than any other to distinguish the loans raised from 1692 onwards from the earlier forms of borrowing.

---

[1] Or rather the taxes in general. M. Postlethwayt (*Dictionary of Trade*, Article "*Funds*") says that the term is used "to signify the several taxes that have been laid . . . to supply the exigencies of the State, and to pay interest for what sums of money it may have occasion to borrow. . . . The funds or taxes, if you please, are either temporary or perpetual."

This combination of political and financial elements in the creation of the English National Debt is undoubtedly important. Prior to the Revolution the financial necessities of the Crown had caused, as might be expected, a groping towards the methods of borrowing which have since become familiar. In the reign of Charles II a successful attempt appears to have been made before the shutting of the Exchequer in 1672 to raise money by direct subscription from the public.[2] The conditions on which it was raised were not essentially different from those which prevailed after 1688. Parliamentary authority was involved, and the money was borrowed on the security of particular sources of revenue granted by Parliament.

Before 1692, however, public borrowing had not developed beyond the stage of an anticipation of the revenue of the Crown. The principal instrument employed in this anticipation was the Tally,[3] a security which appears prior to the reign of Charles II neither to have borne interest nor to have been negotiable. From 1664 onwards, however, there developed the use of the Order of Repayment which possessed, as a public security, considerable advantages over the Tally. By an Act of 1664 [4] it was declared that:

> "All Persons who shall lend any moneys to Your Majesty, and pay the same into the Receipt of the Exchequer, shall immediately have

---

[1] Compare Adam Smith's distinction between anticipation and funding mentioned below.

[2] *Vide* W. Shaw, *The Beginnings of the National Debt.*

[3] These Tallies were of two kinds: Tallies of Loan, which were securities for the sums lent, and Tallies of Anticipation or Assignment. Compare *Parliamentary Papers*, 1857–8, XXXIII, National Debt, pp. 88–90.

[4] 17 Charles II, c. 1.

a Tally of Loan struck for the same, and an Order for his repayment bearing the same Date with his Tally, in which Order shall be also a Warrant contained, for payment of Interest for forbearance, after the Rate of six *per Cent. per annum*, for his Consideration, to be paid every six months until the repayment of his Principal."

Moreover, these orders were transferable by endorsement, were registered, and were to be paid off in the order in which they had been registered. Thus a type of security was created which in many respects resembled the Exchequer Bill introduced in 1696.[1]

It is difficult to say how far this system would have developed but for the shutting of the Exchequer in 1672. Possibly, as has been suggested,[2] these Orders of Repayment might have formed the basis of a State issue of paper money and might thus have delayed for some time the foundation of a central bank with powers of note issue. More probably, being interest-bearing securities, they would have occupied a position in the floating debt very little different from that which the Exchequer Bills subsequently came to hold.[3]

The shutting of the Exchequer is usually regarded as the circumstance in which the earliest portion of the funded debt—the bankers' debt—originated. But this view is hardly accurate. In spite of the obscurity which has been thrown round Charles II's financial policy through subsequent misinterpretation, it seems fairly clear that all that actually happened was a failure on the part of the Government to meet for a year the payments due on these Treasury Orders, the greater portion of which were in the hands of the bankers. Subsequently the King by Letters Patent charged his hereditary revenue with interest at 6 per cent. on the sums due, and this interest appears to have been punctually paid until within about a year before his death. Prior to this regulation the bankers seem to have been receiving interest at the rate of between 8 and 10 per cent., and the step taken may therefore be regarded in the light of a compulsory conversion, the interest on the sums due being reduced to the legal rate of 6 per cent. At the very least there is no ground for the traditional view that Charles II simply seized funds deposited by the bankers at the Exchequer. Equally, it is incorrect to describe the debt to the bankers as the earliest portion of the funded debt. It was only by an Act passed in 1699, after a protracted lawsuit on the subject, that Parliament decided to recognize the obligation. By this Act the hereditary revenue was charged from 25th December 1705 with interest at 3 per cent. on the sum outstanding, power being taken to discharge the debt by repayment of half the principal, which was equivalent to £664,263.[1]

---

[1] For a fuller account of these Orders see W. A. Shaw, "The Treasury Order Book" (*Economic Journal*, Vol. 16).

[2] Shaw, *op. cit.*

[3] It may be noticed that power was taken down to 1808 in the annual Land and Malt Tax Acts to raise money on the security of Tallies and Orders of Repayment as well as upon Exchequer Bills. Cf. *Parliamentary Papers*, 1857–8, XXXIII, National Debt, p. 85.

Against the methods of borrowing which were adopted after 1688 two lines of attack have been directed. In the first place, it has been argued that they were taken over indiscriminately from the financial practice of other countries ; secondly, it has been asserted that they were introduced in order to secure support for the new political *régime*.

Swift thought that the system of funding had been taken from Holland.

> "The present Bishop of Salisbury," [2] he wrote, "is said to have found out that expedient (which he had learned in Holland) of raising money upon the security of taxes that were only sufficient to pay a large interest. I am satisfied that the pernicious counsel of borrowing money upon public funds was taken indigested from the like practices among the Dutch, without allowing for any difference in government, religion, law, custom, extent of country or manners and disposition of the people." [3]

Specific charges on this subject can be neither refuted nor substantiated. There was in Holland a fully developed system of public borrowing, and English financial arrangements could plausibly be treated as a mere imitation of that system. But the practice of borrowing on annuities was at this time common to many European states and was by no means the monopoly of any single one of them. In particular, the principal methods adopted in England after the Revolution—the tontine, the lottery, the loan from the Bank—were originally developed in the Italian cities.[1] Further, a government faced with a considerable war expenditure would not unnaturally adopt the financial expedients which had already been successfully employed by other governments in a similar predicament.

---

[1] Almost the whole of this sum was subscribed in 1720 into the capital of the South Sea Company.

[2] Burnet.

[3] *The History of the last four years of the Queen* (Works ed. Temple Scott, Vol. X, p. 87).

Both Swift and Bolingbroke[2] believed that the desire to attach as many persons as possible to the new *régime* established by the Revolution had been a principal factor in the creation of the National Debt. The grounds for this view are seen clearly in Addison's essay,[3] in which he depicts the Pretender arriving with a sword in one hand and a sponge in the other. And we find a writer in the second decade of the eighteenth century consoling himself with the thought that:

> "supposing the worst, that the Nation should remain some time paying an Annual Interest for such a great Debt, I have this Comfort, the *Protestants* have advanced the Money, and leave it as a Wager, that the *Protestant Succession* shall remain firmly fix'd in the Three Kingdoms."[4]

But here there seems to be a confusion between the causes and the consequences of the public debt. It can fairly be granted that one of the consequences of the new method of raising money was to attach those persons, who became public creditors, by the tie of material interest to the Protestant Succession. But there is no good reason for going behind the motives alleged by the Commons in the first Act[5] which led to the creation of the National Debt when they speak of themselves as "being sensible of the great and necessary Expences in which your Majesties are engaged, for carrying on the present War against the French king; and being desirous to supply the same in such Manner as may be least grievous to your Majesties' Subjects."

---

[1] Cf. Cohn, *System der Finanzwissenschaft*, p. 671.

[2] Works, Vol. IV, p. 351.

[3] *Spectator*, 3rd March 1710.

[4] Cf. A. Hutcheson, *Collection of Treatises relating to the National Debts*, p. 117.

[5] 4 William & Mary, c. 3.

By this Act, passed in 1692, money was to be raised by the device of the Tontine, *i.e.* by life annuities with benefit of survivorship, upon the security of additional excise duties on beer, ale and other liquors. The sum required was £1,000,000, and those who advanced money towards this were to receive 10 per cent. from 1693 to 1700, after which date the sum of £70,000 was to be divided annually in proportion to the amounts subscribed among such persons as the subscribers might choose to nominate. On the death of any of these nominees their annuities would pass to the survivors, until only seven nominees should be left, and then upon the death of each the annuity was to cease.[1]

Provision was, however, made in the Act [2] that, if the sum required should not be advanced by May 1693, any person who subscribed £100 towards making up the difference should have an annuity of £14 either during his own life or during the life of a nominee. And in fact this alternative proved much more attractive than the Tontine. The sum raised on the terms of the Tontine amounted to only £108,100; the sum advanced on the single life annuities was £773,394. Undoubtedly the terms of the life annuities were advantageous to the subscribers, particularly where young lives were nominated. But the failure of the Tontine still remains to be accounted for. Probably the answer lies in the fact that, in spite of Adam Smith's views as to the popularity of Tontines, the type of speculation which they offer does not possess a wide appeal.[3]

In the following year an Act was passed with the object of securing the remainder of the million which had been asked for—£118,506—by offering life annuities on the same terms as before, that is, at the rate of 14 per cent.[1] The important feature of this Act, however, is not the offering of life annuities, but the insertion of a clause, subsequently repeated in all loan acts, guaranteeing exemption in respect of the annuities from all duties and taxes. This guarantee, introduced at first in order to provide an additional incentive to the purchase of the annuities, came before long to form a subject of controversy and of agitation on the part of those who resented the privileged position of the public creditor.[2] From the standpoint of the State it is clearly disadvantageous to introduce into the terms of loans special privileges which involve an indefinite sacrifice of revenue, and it is certainly preferable to offer, if necessary, a higher rate of return on the money lent.

---

[1] Under this Tontine 1,002 lives were nominated. The last of the nominees died in 1783 after having enjoyed an annuity of £1,081. Cf. *Parliamentary Papers*, 1898, LII, p. 315.

[2] § 22.

[3] There were only two other English Tontines, in 1766 and 1789, both of which were unsuccessful.

Not infrequently one finds that these earlier borrowings are passed over and that the year 1694 is taken to mark the beginning of the funded debt. The grounds for this view are clear but not convincing. The year saw the creation of the Bank of England, and the debt to the Bank must be regarded as the original element in the perpetual debt. Since then a large perpetual debt has been created, and the practice has been adopted in the Finance Accounts of the United Kingdom of applying the term "funded" to such debt.[3] But this use of the term "funded," while confusing even in the conditions which prevail to-day, is inappropriate as applied to the financial arrangements which characterized the end of the seventeenth century. Funding, then, may be applied to the raising of loans, otherwise than by mere anticipation of revenue, upon the security of particular taxes, and need not involve the perpetuity of the debt.[4]

Nevertheless, whatever views may be held as to the period at which the National Debt originated, it is true that the events of 1694 were such as to justify the drawing of a clear distinction between the financial methods that were then adopted and the methods of earlier years.

---

[1] 5 & 6 William & Mary, c. 5.

[2] *Vide infra*, p. 38.

[3] The term "unfunded" meaning, therefore, debt which matures at a definite period.

[4] Adam Smith (*Wealth of Nations*, Cannan's edition, Vol. II, p. 398) calls the mortgaging of duties for a limited period "anticipation," and describes mortgaging in perpetuity as perpetual funding, or more shortly funding.

First, in the raising of a loan of £1,000,000 the added attraction of a lottery was provided.[1] This was a fairly expensive arrangement, since the holders of blanks were entitled to receive 10 per cent. on their shares [2] for sixteen years, while 2,500 prize-winners received in different degrees larger annuities for the same period. The total annuity that thus became payable was £140,000. The lottery grew before long to be a favourite device in English funding arrangements and the State, by passing laws for the suppression of private lotteries, attempted to secure a monopoly of the business for itself. The lottery did not indeed become for nearly a century a regular source of public profit; it was inserted as a bait to secure subscriptions to loans and the profits went to the subscribers.

Secondly, £300,000 was raised by a further sale of life annuities.[3] In this case, however, annuities for two and three lives were offered as well as annuities for a single life.[4] The annuities granted amounted to £37,732. Subsequently the plan was conceived of raising further sums by enabling the holders of annuities for single lives to convert into long annuities. These long annuities were granted for 96 years from 1695, and the price of conversion varied from 4½ to 5 years' purchase of the life annuity. Under the provisions of various Acts the whole of the single-life annuities were thus converted. The expedient was clearly one of a financially embarrassed government.

The foundation of the Bank of England naturally involves much wider considerations than those of public finance. The influence of the Bank upon the development of banking in England and of the system of note issue is certainly of primary importance. Moreover, this influence has been permanent, whereas the Bank's influence upon the creation and organization of the funded debt (apart from the question of the management of that debt) has been of a transitory character. It may indeed be pointed out that part of the present funded debt consists of the debt due to the Bank. But the practice of borrowing directly from the public has developed so enormously that the debt to the Bank forms only a very small proportion of either the funded debt or the total National Debt. Thus the Bank debt possesses now a purely historical significance.

---

[1] 5 Wm. & Mary, c. 7.

[2] The shares were £10 each.

[3] 5 Wm. & Mary, c. 20.

[4] The terms being 14 per cent. for single lives, 12 per cent. for two lives, and 10 per cent. for three lives.

In the case of the floating debt, however, the course of events has been entirely different. But here we are dealing with the normal development of banking methods, which relate to the granting of short-period loans and advances. Thus while the Bank's association with the creation of the funded debt was at the outset of considerable significance and thereafter diminished in importance; it was at first not concerned with the floating debt, but subsequently, through the part entrusted to it in the management of the Exchequer Bill circulation, became the principal instrument employed by the Government in securing temporary loans and advances.[1]

The Bank advanced to the Government £1,200,000, receiving in return an annuity of £100,000 which represented interest at 8 per cent. and an allowance of £4,000 for management. This annuity was charged on duties on Tonnage and on Excise. The Act[2] incorporating the Bank provided for the termination of its privileges (a year's notice from 1st August 1705 being given) by the repayment of the principal of the loan together with all arrears of interest.

The significance of this loan lies in two directions. First, it represented, as has been seen, the original element in the perpetual debt of the State. For some years such debt bore a small proportion to the total debt, but its superiority, from the standpoint of the State, over debt repayable at a definite date was so marked that after 1714 borrowing normally took the form of the creation of perpetual annuities. In particular, perpetual debt redeemable at the option of the State lends itself to conversion operations which cannot be performed upon terminable annuities. The desire to obtain the benefits of conversion was in fact the principal motive which led in 1720 to the ill-fated scheme of the South Sea Company.

---

[1] Its position in this matter, as will be seen later, was considerably strengthened by the collapse in 1720–1 of its chief rival, the South Sea Company.

[2] 5 Wm. & Mary, c. 20.

Secondly, the loan from the Bank is an example of a method which played a considerable part in the financial policy of this period, the method of financing the State by privileged corporations. Obviously loans could be secured on more favourable terms if they were obtained from companies under arrangements which granted these companies extensive banking or trading privileges. Possibly also, though this is more doubtful, better terms could be obtained by borrowing from corporations than by borrowing direct from the public.

The three great companies which helped to finance the State were the Bank of England, the East India Company and the South Sea Company. In 1698 the new East India Company[1] was established with certain trading privileges, in return for which it made a loan to the Government of £2,000,000, receiving a perpetual annuity at the rate of 8 per cent. on the sum thus advanced. Thirteen years later came the formation of the South Sea Company.

It is clear that the whole direction of funding policy turned increasingly towards reliance upon financial assistance from the companies. It was natural that in the earlier stages of the development of the funding system the State should look for support, in operations which involved either borrowing or consolidation of debt, to the three Corporations. Ultimately the evolution of financial policy along these lines led up to the control of practically the whole debt by the Bank, the India and South Sea Companies, a control which might have had a considerable degree of permanence but for the financial collapse of 1720–1. After that collapse, however, the policy of financing the State by corporations was discredited, while subsequent developments in the organization of the debt gave increasing scope to the method of raising money directly from the public, which has since then been regularly pursued.[1]

---

[1] In 1702 this Company was amalgamated with the old East India Company chartered in 1600.

Whatever use may have been made of funding it could still be said that the floating debt constituted the most urgent financial problem of the time. Tallies were at a considerable discount, and this obviously made them an expensive method of raising money in anticipation of incoming revenue. In point of fact the produce of the various duties was insufficient to meet the charges created by this anticipation of revenue through Tallies of loan. At the end of 1696 the total deficiency arising out of this insufficiency of the public revenue to meet the charges thus imposed upon it amounted to no less than £5,160,460.

NB

The solution of this problem was found in three directions: first, in the creation of the Exchequer Bill; secondly, in the mortgaging of the duties for a term of years; thirdly, in the funding of the floating debt.

The Exchequer Bill when first introduced[2] appears not to have differed considerably from the Treasury Order of Repayment which has already been described. The Bill was a negotiable security, payable on demand, and bearing a rate of interest not exceeding 3*d.* per diem on every hundred pounds (*i.e.* £4 11*s.* 3*d.* per annum). In 1696 an issue of £1½ million was authorized, but of this sum only £159,169 were actually issued.[3] In the following year a further issue of £1½ million was authorized,[4] the rate of interest being fixed at 5*d.* per diem on each hundred pounds (*i.e.* £7 12*s.* per annum).

In this second issue two new principles were introduced which clearly distinguished the Exchequer Bill from other forms of floating debt. First, the Bills were to be received in payment of taxes, a measure which was evidently intended to improve the conditions of their circulation. Secondly, an arrangement was made, with the same purpose, to entrust the management of the circulation of the Bills to a body of persons who would cash them when they were presented. The Commissioners of the Treasury were empowered to make arrangements with such persons "for the immediate Advancing of Money from time to time . . . for Exchanging such Bills as shall be so Refused or not Accepted or Taken in Repayment of Tallys and Orders." The persons who thus agreed to exchange the Bills were to "have as a further Encouragement an Interest not exceeding ten per cent. per Annum for the Sums by them agreed to be advanced."[1]

---

[1] The only other instance of Corporation finance appears to be the establishment of The Royal Exchange Assurance Company and The London Assurance Company which were to advance £300,000 to the State. Cf. *The History of the Bank of England and its financial services to the State* (a translation of *Die Bank von England in Dienste der Finanzverwaltung des Staates*, by E. von Phillipovich), pp. 94–5.

[2] Provision was made for the issue of Exchequer Bills in an Act for continuing certain duties upon glass, salt, etc. (7 & 8 Wm. III, c. 31).

[3] This issue does not appear to have been well received. Cf. *Parliamentary Papers*, 1857–8, XXXIII, National Debt, p. 96.

[4] 8 Wm. III, c. 6. For the rate of interest see 8 & 9 Wm. III, c. 20.

By the same Act as that in which this contract for circulating Exchequer Bills was authorized the First General Mortgage was established. This Mortgage took the form of the consolidation and continuance until 1706 of certain expiring duties, with the object of securing the payment of interest on and the repayment of the principal of floating debts for which at the time there was no adequate provision. The method of prolonging duties which were inadequate to meet the charges imposed upon them provided a simple way out of financial difficulties and was repeatedly adopted. In fact, of course, it offered a solution of these difficulties only to the extent to which no further anticipations of the incoming produce of the duties in question were undertaken. In practice the Government showed no such restraint, and the duties were prolonged by six General Mortgages until in 1711 a mass of floating departmental debts was taken over by the South Sea Company.

The chief modern device employed in connection with a large floating debt is that of funding; in other words, the transformation of debt repayable at short notice into debt that either need never be repaid or need only be repaid some years hence. This device seems first to have been introduced in 1697. In that year the Bank of England received an extension of its charter and was authorized to increase its capital by £1,001,171, four-fifths of this increase to be paid in Tallies and one-fifth in bank bills or notes. On this new debt represented by the funding of the Tallies the State paid interest at the original rate of 8 per cent.[1]

---

[1] 8 & 9 Wm. III, c. 20. Trustees appear to have been appointed and to have managed the circulation of the Bills until in 1707 the business was entrusted to the Bank. Cf. Redington, *Calendar of Treasury Papers*, Vols. II and III. In Vol. III, p. 353 (June 1705), there is a reference to the twelfth contract for circulating Exchequer Bills.

At the peace of 1697 the capital of the debt amounted to £14,522,925, and the debt charge to £1,322,519.[2] Even if allowance were made for the capital value of the terminable annuities, it would still be true that by far the greater portion of the debt was of a floating character and consisted mainly of sums borrowed in anticipation of duties. The problems of this period bear, therefore, very little relation to the problems which dominated the greater part of the eighteenth and the nineteenth centuries when perpetual debt was the central, if not the sole, element in the situation. Sinking funds and conversions had not even been discussed, and financial policy was mainly concerned with makeshift arrangements for meeting the urgent needs of the State as they arose. A system of taxation had to be devised and put into operation, and until this had been done the main consideration was that of postponing by one means or another the necessity of payment.

Nevertheless, although the problems of this period differ completely from those which were characteristic of the fully developed funding system, the debt had already become a topic of economic discussion. Davenant in 1698[3] examined the origin and nature of public indebtedness, considered the means available for escaping from the burden which it imposed, and compared the situations of England, France and Holland with respect to their debts and their national resources.

---

[1] This debt was however paid off in a few years, and the capital of the Bank was reduced in 1707 to its original amount.

[2] *Parliamentary Papers*, 1857–8, XXXIII, p. 166. The debt charge was made up as follows:

	£
Interest on perpetual debt and annuities .	411,407
Interest on floating debt	911,112

[3] *Discourses on the Public Revenues and on the Trade of England.*

Davenant realized clearly the burden of a public debt, and he would not have shared the views of those who in the following century attempted to represent the debt either as no burden at all or even as a positive addition to the wealth of the nation.

> "A People," he says, "is more or less easy, as the Taxes and Payments to the Publick are more or less; upon which Score it must needs be Wisdom in a State to hasten the clearing off its Debts, which being commonly attended with a high Interest bring a heavy Burden upon Posterity."[1]

He found particular objection to the existing debt in the fact that its charge absorbed such a large proportion of "the former Revenue of the Crown, that hardly anything remains to support the Government. Whatever can arise from Trade is already charg'd to the Height."[2] Hence it followed that "the Land and Labour of the People must go to enrich the mony'd Men and Usurers and not to support the Government."

It is clear, however, that Davenant recognized that in time of war the inadequacy of the public revenue to meet the increased expenditure of the State makes borrowing a practical necessity. The governments of France and Holland had borrowed for war purposes and had run heavily into debt. Something could even be said on behalf of the financial methods which the English government had adopted. "The Kingdom's Debt has not been so much increas'd by Interest-Mony as by high Premiums, which, during this War may be, could not be avoided."[3]

In Davenant's work there appears that contrast between the idle creditor and the industrious classes of the community which became so strongly developed in later writings on the subject of the debt. Those who lent upon parliamentary funds "have for their security the quick and dead Stock of the Kingdom; the Land with its Product; the Arts, Industry, Labour and Manufactures of the Country; all of which, some way or other, become affected with the Debt."[4] Thus, "if we let a long Debt continue, by sinking the Principal, we pleasure one part of the People at the Expence of the other; that is to say, we gratify the Mony'd Men and Usurers who are the Drones of the Commonwealth at the Cost of the Landed Man, the Farmer, and the Industrious Merchant."

---

[1] *Discourses*, p. 200. [2] p. 173. [3] p. 47. [4] p. 41.

There is, however, no evidence of despondency in Davenant's analysis of England's financial position. He shows no sign of fear as to the possibility of a bankruptcy, a fear which was repeatedly expressed in the latter half of the eighteenth century. On the contrary, he calculated that the nation possessed £600 millions in "Land and Stock of all kinds, most of which, some way or other, being made liable to publick Debts, 'twill upon Examination be judg'd a sufficient Security to such as have Dealings with the Government." [1]

He ascribed the existing financial difficulties to the existence of the large volume of Tallies which imposed a charge that could not be met out of the current revenue. But he believed that the arrears could be cleared off by a policy which would both introduce improvements into the collection of the revenue and would also secure additional contributions from the public.

The financial position of England was superior, so Davenant held, to that of Holland and still more so to that of France. "'Tis evident," he says, "that the Publick of England is less encumber'd than the Publick of France or Holland, the Debts and general Rental or Annual Income of the respective Nations consider'd." This view he illustrated by the following table: [2]

		England £	France £	Holland £
Annual Income	before the war	44,000,000	84,000,000	17,500,000
	since the war	43,000,000	81,000,000	18,250,000
Revenues		3,355,472	13,500,000	4,750,000
Debts		17,552,544	100,130,000	25,000,000

He thus came to the conclusion that England could pay off its debt more quickly than either France or Holland could pay off theirs.

The objection that there was no need to pay off the debt Davenant regarded as based upon a mistaken comparison with the condition of Holland.[3] In Holland the money required to meet the charge on the twenty-five millions of debt was raised mainly by excise duties, so that "as to what is paid out of their Annual Income, 'tis indifferent through what Hands it passes." In England, on the other hand, the charges on the debt were met by the imposition of taxes upon land and trade, and the public creditor was thus supported at the expense of the active members of society. It is clear that Davenant was opposed to the creation of a permanent debt. He thought that even in the case of Holland "letting these Debts continue so long . . . has been perhaps an Error in their Constitution"; while Spain was "a sufficient instance of what a weight old Debts are upon any Country." Finally he indicated that, given careful administration and sound finance, England should be able within a few years to rid herself of her debts.

---

[1] *Discourses*, p. 58.

[2] p. 193.

[3] "It may be objected, that they who have Securities upon the Publick, may desire, as they do in Holland, to sink the Principal, and choose rather to receive a good Annual Interest; and consequently

The financial consequences of the war of the Spanish Succession involved the discrediting of the views which Davenant had put forward. Whereas in 1700 the debt consisted mainly of floating obligations maturing either immediately or within a short period of time, by 1714 the funded debt had become predominant, and of this the greater part was, in form at least, perpetual and redeemable. It cannot be assumed that the permanent existence of the debt was regarded as inevitable in 1714, but the change which had occurred both in its size and in its composition indicated clearly that repayment and redemption could only be achieved by a gradual process extending over a considerable number of years. The modification in point of view is hardly seen more clearly than in the proposals which cropped up after the close of the war for converting the various forms of terminable annuities which constituted the irredeemable debts into perpetual redeemable annuities.

Formally, however, the methods of borrowing adopted between 1702 and 1714 did not differ considerably from those practised during the earlier years of the debt. Money was raised, as before, by the creation of annuities for terms of years, by lotteries and by loans from the companies. Between 1704 and 1709 annuities for 99 years were sold at from fifteen

that to make such Haste in clearing these Debts cannot be of such Importance; it being all one to the whole Body of People what is receiv'd or paid among one another." *Discourses*, pp. 200–1.

to sixteen years' purchase. In 1710 two sets of 32-year annuities were created, the first having a lottery attached and the second offering a return of 9 per cent. After these terminable annuities came a series of lottery loans amounting altogether to £9,000,000. Holders of blanks were entitled to annuities which varied from 6 per cent. (in 1710) to 4 per cent. (in 1713) on the sums advanced, and prize-winners received various larger amounts. Thus the profits of the lotteries were given away to the subscribers.[1] Although the annuities were to continue until the principal of the loans should be repaid, and the lottery loans formally represented an addition to the perpetual debt, the duties upon which they were charged were not granted in perpetuity. On this account there seems to be a justification for the traditional view that the first genuine debt to the public on perpetual annuities was represented by the loans of £1,079,000 at 5 per cent. raised in 1714–15 on the security of duties consolidated, and made perpetual by the establishment of the Aggregate Fund.

The policy of obtaining financial assistance from the companies was developed considerably during this period. Nor was this merely a question of raising further loans from the Bank and the East India Company, or even of the establishment of the South Sea Company. The Bank, indeed, advanced a further £400,000 to the State in 1709, and since its annuity was not increased the rate of interest on the debt due to it was thereby reduced from 8 to 6 per cent. Similarly the East India Company made a further loan to the State in 1708 of £1,200,000 without interest, the rate of interest on the debt due to it being thereby reduced from 8 to 5 per cent.

More important, however, than these loans were certain arrangements which affected the administration of the debt. Attention has been already drawn to the action of the Government in introducing measures which would secure the circulation and acceptability of the Exchequer Bill. Exchequer Bills were taken in payment of taxes, and a body of trustees had been established in order to cash the Bills when they were presented for payment. A further stage in the development of these measures occurred in 1707, when an arrangement was made with the Bank for "circulating" £1,500,000 of Bills. In other words, the Bank undertook to cash the Bills when they were presented, fixed the rate of interest which should be paid upon them, and received for its services from the Government payment at the rate of 4½ per cent. on the Bills issued.[1] In the following year a further arrangement of this sort was made, and the Bank undertook to "circulate" £2,500,000 Exchequer Bills. In this case, however, the State fixed the rate on the Bills at 2*d.* per cent. per diem, the Bank receiving payment for its services at the rate of 3 per cent. Finally, in 1710, the Bank agreed to fund the Bills issued in 1707, which together with accrued interest now amounted to £1,775,028, and received a return at the rate of 6 per cent. on this addition to the permanent debt.

---

[1] Actually in a lottery loan of £2,000,000 in 1711 all the tickets were prizes; in addition to the 6 per cent. annuities a bonus of £602,200 with the same rate of annuity was distributed among the subscribers.

Funding of the floating debt was no new device; it had already been employed in 1697 when a certain proportion of Tallies was funded into the permanent debt due to the Bank. But the policy of entrusting the management of the floating debt to the Bank was entirely new, and marked an important advance in the functions which the Bank performed.[2] It was, in fact, the first step towards the management of practically the entire debt which the Bank ultimately secured. Such a development was almost certainly not foreseen in 1707–08 and it was only realized gradually during the course of the eighteenth century. Clearly the contract with the Bank appeared at the time to be nothing more than a further move in the direction of attaching to the Exchequer Bill circulation a security which had been so markedly absent in the case of the earlier forms of floating debt. Since the Bank undertook to cash these Bills on demand their position from the standpoint of the holder became hardly different from that of the Bank's own notes.

---

[1] The payment was to be made out of the proceeds of the house duty, but as this duty was already charged with a loan, further Bills were issued to cover the allowance.

[2] The Bank did not, however, finally secure the management of the Exchequer Bill circulation until after the collapse of the South Sea Company.

The result of these arrangements was to give the Exchequer Bill a complete superiority over the Tally. Henceforward it became the principal instrument employed by the Government in the anticipation of revenue, and thus the chief element in the floating debt.

Nevertheless, while the Exchequer Bill was being put on a sound basis, inadequate provision was made for meeting the charges created by other forms of floating debt. A special problem had arisen, a problem which was frequently encountered during the eighteenth century, in connection with the debts of various public departments. The practice had developed for these departments to borrow up to the limit of the particular sums appropriated by Parliament, each department being responsible for the amount so borrowed to its own creditors. In this way there were issued navy and victualling bills and ordnance debentures. These arrangements worked no doubt successfully during a period of solvency; but in the financial embarrassment which developed in the course of the war they produced a situation not very different from that which had arisen in 1696. The revenue was inadequate and the departmental debts went unpaid.

It is fairly clear that during the latter half of the war serious financial difficulties were experienced. Loans were raised on extremely unfavourable terms; bills were issued to pay the interest on bills; duties which would have expired had to be continued in order to cover arrears which had not yet been met. Evidence of these difficulties is also shown in the insistence with which the author of an *Essay upon Publick Credit*[1] maintains that this credit does not depend upon the change of the ministry or the dissolutions of Parliament. Certainly the association of the Whigs with the creation of the debt must have rendered even more difficult the conditions under which the financial policy of the Tory ministry of 1710 had to be carried out.

In these circumstances a solution of the problem of the departmental debts was found in a resort to the old policy of securing financial assistance from privileged companies. The South Sea Company was created, which in return for the exclusive right of trading to the South Seas, agreed to take over various debts [1] for which no provision had been made. The Company was, in fact, created in order to carry out a funding arrangement. Its capital of £9,177,968 [2] represented the liabilities which were funded, and on this sum it received a perpetual annuity at the rate of 6 per cent. It thus performed a function which the Bank of England had already performed on two previous occasions. It differed, however, both from the Bank and from the East India Company in that its origin was definitely associated with a measure of funding, not with the granting of a loan. Moreover, while it possessed functions outside the financial sphere, these functions were much less important than those of the Bank, and were obviously more in the nature of an inducement to render assistance to the Government. Thus the South Sea Company from its foundation bore chiefly the character of an institution formed for the administration of the public debt, a character which provided after 1720 its sole justification.

---

[1] Attributed by McCulloch to the Earl of Oxford.

As a result of these measures the composition of the debt of 1714 differed considerably from that of the debt of 1702. The principal of the debt now amounted to £36,175,460, the annual debt charge to £3,063,135.[3] But of this principal not much less than half—£15,752,996—consisted of the debts due to the three companies, while of the remainder only £8,355,139 represented unfunded or floating obligations.[4] Thus the conditions of a permanent debt had practically been realized. In form, however, this debt bore little resemblance to the permanent debt as it existed after 1750. Its predominant feature lay in the obligations of the State

---

[1] These debts included not only navy, victualling, transport, army and ordnance debts, but also loans raised in anticipation of duties.

[2] Four years later, in 1715, its capital was increased to £10,000,000 by the addition of arrears of interest and by a new loan to the State.

[3] *Parliamentary Papers*, 1857–8, XXXIII, p. 168. The debt charge was distributed as follows:

	£
Interest on perpetual debt and annuities .	2,522,826
Interest on floating debt	540,309

[4]

	£
Exchequer Bills	4,678,348
Navy Bills	95,021
Loans in anticipation of duties . . .	3,581,770

to the three companies. The other elements in the debt, the various annuities, whether for terms of years, for life or for perpetuity, had not been consolidated. The typical public creditor of more recent times, the holder of Government stock redeemable only at the option of the State, had not yet arisen.

CHAPTER II

THE SINKING FUND

The authorship of the first sinking fund in Great Britain has been usually ascribed to Walpole.[1] Walpole described himself as the father of the fund, thereby implying that the plan had originated with him, although it had been left to Stanhope to put it into execution. Nevertheless, while Walpole undoubtedly prepared the way for the introduction of the measure, the scheme probably owed its actual form to Paterson, the founder of the Bank of England.[2] Paterson examined the problem at the request of Walpole and produced a book [3] " with calculations . . . by which he made it appear that in almost twenty-two years the nation might be effectually clear of debt." [4]

The whole question of the sinking fund turned primarily on the possibility of converting the greater part of the existing debt to a lower rate of interest. The idea of devoting a surplus to the redemption of debt is not profound, and if this had been the only question at issue the matter could have been settled without much difficulty. The problem as it presented itself in 1715 was that of securing the surplus; not through an increase of taxation nor through retrenchment, but by a reduction in the debt charge. The plan of redemption, so far as a definite plan existed, was associated with the policy of applying the saving on debt redeemed to the purchase and redemption of additional debt.

---

[1] McCulloch (*Treatise on the Principles and Practical Influence of Taxation and the Funding System*, p. 449) erroneously attributes the idea to Stanhope and its execution to Walpole.

[2] Cf. *The Conduct of Robert Walpole, Esq.*, quoted in *The Writings of William Paterson, founder of the Bank of England* (Vol. II, p. 305), by S. Bannister.

[3] *An Inquiry into the State of the Union of Great Britain and the Past and Present State of the Trade and Public Revenues thereof. By the Wednesday's Club in Friday Street* (1717).

[4] Bannister, *op. cit.*, p. 307.

The reduction of the legal rate of interest from 6 to 5 per cent. in 1714 indicated the possibility of a corresponding reduction of interest on the National Debt. Precedents for such a reduction could be found in the financial history of other countries. In Paterson's *Wednesday Club's Dialogues in Friday Street* it was pointed out that the French "after the peace . . . not only reduced the interest on public securities to the twenty-fifth penny, or four per cent. per annum, but made the proprietors of such securities accountable for the surpluses they received above that rate during the wars."[1] Again at Rome "the interest on the public securities was four per cent. till Pope Innocent the Eleventh about thirty years ago . . . did by redemption reduce the four per cent. to three."[2]

In England the principal difficulty in the way of a considerable conversion of debt from 6 per cent. to 5 per cent. lay in the existence of a large amount of terminable annuities. In 1714 annuities for lives or for terms of years probably represented a capital liability equal to one quarter of the total debt.[3] This "irredeemable" debt naturally lay quite outside the scope of conversion, and it was clear from the outset that any scheme for the reduction of interest must depend very largely upon the attitude of the three companies, the Bank, the South Sea Company and the India Company, who not only held a large portion of the debt but would also be able to advance sums in order to repay those persons who refused their consent to such a reduction.

In 1717, after the basis of the sinking fund had been established, Walpole attempted to test the conditions of the money market by offering a loan of £600,000 at 4 per cent. The attempt failed and the loan was actually raised at 5 per cent.

---

[1] Bannister, *op. cit.*, p. 52.

[2] Bannister, *op. cit.*, p. 53. Anderson (*An Historical and Chronological Deduction of the Origin of Commerce*, Vol. II, p. 97) says that Paterson learnt this from Burnet. See Burnet's *Letters and Travels* (3rd Edit.), pp. 190–1.

[3] Hamilton, *Inquiry concerning the National Debt* (3rd Edit.), p. 93, puts the total debt at the Peace of Utrecht at £47,111,113, the annuities for lives or for terms of years at a capital liability of £12,545,356.

But the success of the conversion scheme was secured by agreements which were reached with the Bank of England and the South Sea Company. The Bank agreed to a reduction of interest from 6 per cent. to 5 per cent. with respect to the annuity of £106,501 which it had been granted in 1710;[1] it cancelled £2,000,000 of Exchequer Bills and received in return an annuity at the rate of 5 per cent. upon the capital thus cancelled; and it promised to advance £2,500,000 should it be necessary for the State to pay off holders of public securities.[2] The South Sea Company also agreed to a reduction of interest from 6 per cent. to 5 per cent.,[3] which on its capital of £10,000,000 involved a saving of £100,000. It also declared its willingness to advance £2,000,000 in order to pay off dissentients.

The conversion which was carried out by Stanhope proved completely successful. The interest on the redeemable debt was reduced to 5 per cent.,[4] and a saving of £324,455 was thus obtained. Opposition to the scheme does not appear to have been serious, though it is not surprising to learn that while "the landed men and gentlemen throughout the whole island generally embraced it," nevertheless "the monied men and the stock-jobbers chiefly in the City of London were against it."[5] The attitude of the general body of creditors is probably represented in the statement made by one of them to Stanhope that "though his interest was diminished he should think his principal more secure than ever."[6]

The legal framework of the sinking fund was not, of course, created simply by the conversion of debt. The actual procedure by which debt redemption was secured consisted in the consolidation of the existing duties,[7] charged with the payment of the various debts and all made perpetual, into three funds—the General, the Aggregate and the South Sea—and the application of the surpluses of these funds beyond what was required for the payment of interest to a sinking fund devoted to the repayment of the principal of the sums borrowed. The Act of 1716,[1] in which these provisions were contained, prescribed a rigid adherence to the purpose for which the sinking fund had been established. The surpluses were to be "appropriated, reserved and employed to and for discharging the Principal and Interest of such National Debts and Incumbrances as were incurred before the five and twentieth day of December, 1715 . . . and to and for none other Use, Intent or Purpose whatsoever."

---

[1] Its original £100,000 was not to be reduced.

[2] 3 Geo. I, c. 8.

[3] 3 Geo. I, c. 9.

[4] The East India Company's capital had already undergone a reduction of interest from 8 per cent. to 5 per cent. in 1708, when it advanced £1,200,000 to the Government without interest; *vide supra*, p. 17.

[5] Bannister, *Life and Writings of William Paterson*, Vol. II, p. 306.

[6] *Bolingbroke's Works* (1809 Edit.), Vol. IV, p. 351.

[7] These duties included all taxes except the Land Tax and the Malt Tax which were voted annually.

The constitution of every sinking fund is liable to criticism. It is easy to show that such funds either make no regular provision for the redemption of debt or are so rigid as to provide for redemption when there is no real surplus of revenue over expenditure available for that purpose. The only solution which has so far been devised to meet this dilemma has rested upon the maintenance of a fixed sinking fund which can be suspended upon the outbreak of war or the occurrence of some other emergency which necessitates borrowing.

But even if this solution is adopted, the problem of maintaining the sinking fund during a period of peace still remains. The raiding of sinking funds has become so familiar that the impossibility of erecting a completely adequate legal safeguard is now generally recognized. Ultimately any legal arrangement must break down in the face of the inability of a Parliament, however constituted, to bind its successors. The fund must accordingly depend for its continuity upon the readiness of a Parliament to recognize the arrangement which its predecessor has made. It has been suggested that these arrangements should be regarded as possessing the binding character which is attached to the payment of interest by the State on its debt. But there is clearly no basis for a comparison of this sort. The sinking fund does not rest, as does the payment of interest on a debt, upon a contractual basis. Hence proposals have been put forward with the object of associating with the fund that element of contract which is present in the payment of interest. In such proposals, however, the nature of the mass of public securities is generally overlooked. These securities are for the most part represented by perpetual annuities; here the State incurs no obligation for redemption, although it is entitled to repay at par if it wishes to do so. In the case of terminable annuities, on the other hand, with the annual payment of interest a certain portion of the capital is repaid, until the whole is cleared off. Here repayment of capital enters into and forms part of the contract. It has therefore been supposed that terminable annuities should be employed in order to secure a system of redemption which cannot be infringed. It is possible that in the early years of the debt such a policy might have been adopted with advantage, but, as will be seen later, the unpopularity of terminable annuities from the standpoint of the ordinary investor very much limits their use in debt repayment.

---

[1] 3 Geo. I, c. 7.

These legal difficulties presented themselves in regard to the sinking fund of 1716–17. Moreover, the fund suffered from certain defects peculiar to its own constitution. If provision had been made for the regular application of a certain annual sum to the redemption of debt,[1] there would still have remained the possibility that this sum might be misapplied through a diversion of its income to objects for which it was not originally intended. Obviously the sinking fund of 1716–17 might be misapplied in this way. But it was also open to the danger that it might be deprived of its income. If Parliament repealed any of the duties that went to make up the Aggregate, General or South Sea Funds and failed to replace them by other duties, the income of the sinking fund would clearly be diminished. There was also a still more insidious way of raiding the fund. Parliament might borrow without having imposed an adequate amount of additional taxation to meet the charge on the new loan. Nothing could then be simpler, and nothing would be more likely to escape public attention, than the diversion of the surpluses which would otherwise have gone to the sinking fund to defray the interest on the sum borrowed.

The success of the conversion of 1717 suggested that further

[1] As was secured, for example, in the sinking fund of 1786.

operations might be undertaken. It was necessary, however, for the execution of a scheme of this sort that some method should be devised for placing the "irredeemable" annuities upon a redeemable basis. In the South Sea Company, which had already rendered valuable services in the negotiation of the debt, the Government possessed a suitable instrument for bringing about this transformation. It was impossible, owing to the nature of the contract, to compel the holders of terminable annuities by threat of redemption to accept a lower rate of interest. But an arrangement might be effected whereby these holders would exchange their annuities for South Sea Stock, the South Sea Company receiving from the State in return a perpetual annuity capable of redemption. The Company would, in fact, buy out the annuitants, and by altering the nature of the debt charge enable the Government to take advantage of a fall in the rate of interest.

In 1719 the South Sea Company took over a portion of the lottery annuities created in 1710 for a period of thirty-two years. Annuities to the amount of £134,998 12*s.* per annum were subscribed into the stock of the Company at eleven and a half years' purchase. By this operation and by an advance to the Government the capital of the Company was increased by £1,746,844, on which it received 5 per cent. per annum.

In 1720 a scheme on a very much larger scale was put forward. It was proposed that the Company should buy up the rest of the terminable annuities and should also take over a large quantity of redeemable debt. The National Debt would be placed by this arrangement in the hands of the South Sea Company, apart from that portion of it which was held by the Bank of England and the East India Company.

Undoubtedly if this plan had been carried into effect, the future development of the debt would have taken place along very different lines from those which it actually followed. A single corporation would have secured complete control of the administration of the debt, its monopoly being qualified only by competition from the Bank and, to a very much smaller extent, from the East India Company. Ultimately the Government would have borrowed directly from the outside public, who very probably preferred to hold the securities of the State rather than the stock of a Company which placed itself between them and the borrower.[1] But in the meantime the Company might have derived immense advantages from its position, and serious difficulties might have been experienced over the breakdown of its monopoly.

It was intended, however, that from the transaction of 1720 the State should secure a considerable profit. In return for certain trading privileges the Company agreed to take over the debt,[2] receiving a perpetual annuity of 5 per cent. on the greater part of its holding, which was to fall to 4 per cent. in 1727. But this was not the only advantage that was to be obtained. Prior to the settlement of the bargain the South Sea Company had been forced to meet a keen competition from the Bank for the privilege of trading in the debt, and this competition had driven both parties to offer extravagant terms to the Government. The South Sea Company had at length secured the contract by offering to pay £4,156,306 4*s.* 11*d.* for the conversion of the redeemable debt, and four and a half years' purchase for those annuities for lives and for terms of years which might be subscribed into its stock.[3] These sums were to be devoted to the redemption by the State of debts existing prior to December 1716.

Total £7,000,000

Clearly the arrangement was a serious threat to the position which the Bank occupied in the administration of the debt. In this administration the Bank had secured in recent years more and more extensive privileges. It managed the floating debt; it had been entrusted with the payment of certain annuities; it had received subscriptions to some of the loans which had been raised. The contract with the South Sea Company implied a check to the growth of its power in the future. Not only had the Company taken over the funded debt; it had also entered a sphere which had hitherto been occupied exclusively by the Bank—the management of the floating debt. Under the arrangement of 1720 the Company undertook to circulate £1,000,000 in Exchequer Bills for seven years, and to pay the interest on them without receiving any remuneration from the State for the service rendered.

---

[1] Cf. *Some Considerations on the National Debt* (1729): "The public creditors by being removed from the Exchequer have not the same Security of the National Faith and Justice for the Punctual Payment of their Principal and Interest, which they had before, but are too much exposed to the Danger of becoming one Time or another the Property of their Managers."

[2] Except that due to the Bank and the East India Company.

[3] Also one year's purchase for such irredeemable annuities as should not be subscribed into the Company's stock before 1st May 1721.

The result of this consolidation of debt in the hands of the Company was as follows :[1]

1. Redeemable Debts

	Capital Subscribable			Capital Subscribed		
	£	*s.*	*d.*	£	*s.*	*d.*
5 per cent. . .	11,779,380	2	10	10,146,046	1	1
4 per cent. . .	4,766,821	15	9	3,839,363	13	1

The amount of stock created, the subscription taking place at par, was thus £13,985,409 14*s.* 2*d.* The £2,560,792 4*s.* 5*d.* unsubscribed were paid off between 1723 and 1728.

2. Irredeemable Debts[2]

	Subscribable Annuities			Annuities Subscribed			Stock Created		
	£	*s.*	*d.*	£	*s.*	*d.*	£	*s.*	*d.*
(i) Long Annuities at twenty years' purchase[3] .	666,566	1	7	535,362	15	7	10,707,255	12	6
(ii) Short Annuities at fourteen years' purchase[4]	121,669	0	0	97,335	5	0	1,362,693	10	0

The total debt to the Company thus amounted to :

Capital				Interest		
£	*s.*	*d.*		£	*s.*	*d.*
33,962,839	12	5	at 5 per cent. .	1,698,141	19	7
3,839,363	13	1	at 4 per cent. .	153,574	10	11
£37,802,203	5	6		£1,851,716	10	6

The total charge, including the payment for management on the previous debt, amounted to £1,861,114.

The terms which had been offered to the Government were obviously far too extravagant to be capable of being fulfilled.

---

[1] Cf. *Parliamentary Papers*, 1898, LII, pp. 278–81.

[2] Long Annuities mostly for 99 years ; Short Annuities for 32 years.

[3] Originally at 15–16 years' purchase.

[4] Originally at 11½ years' purchase.

After a speculative boom which was not confined to the stock of the Company a collapse occurred and the greater part of the scheme had to be abandoned. Walpole proposed to save the situation with the help of the Bank and the East India Company. He produced a plan by which these two companies would each take over £9,000,000 of South Sea Stock. Not unnaturally, however, the measure failed to pass and ultimately only £4,000,000 of South Sea Stock were amalgamated with the stock of the Bank of England.

The only solid advantage which had been secured from the South Sea Scheme was the reduction of interest on a very large portion of the debt from 5 to 4 per cent. in 1727. It might therefore be claimed that the main object of the scheme had been achieved. But this reduction in the debt charge did not represent a clear gain. Against it had to be set the increase in the capital of the debt beyond the sums originally lent to the State on account of the terms adopted in the conversion of the terminable annuities into a perpetual annuity. Thus an annuity of £100 which had originally been bought at fifteen or sixteen years' purchase was now represented by a debt of £2,000 due to the Company.[1]

The payments which were to have been made for the privilege of taking over the debt and which were to have been applied to the redemption of debt could obviously not be obtained, and the Company was accordingly discharged from this obligation. In 1722 £2,000,000 of the Company's stock were cancelled, but the gain thus secured was not permanent, since the cancelled stock was recreated two years later. Although, therefore, the scheme had made possible a reduction in the debt charge it had made no direct contribution towards the redemption of debt.

The period which succeeded the Peace of Utrecht was fruitful with proposals for discharging the National Debt. The conception of a perpetual debt which gradually developed during the eighteenth century had as yet found no expression. The practice of borrowing from the public on perpetual annuities had indeed been adopted in 1715 when two loans aggregating £1,079,000 had been raised at 5 per cent., and the duties charged with the payment of such annuities had been made perpetual. But this type of borrowing clearly did not involve the notion of a perpetual debt. It was adopted because it represented a convenient arrangement whereby, although the lender could not claim repayment, the borrower could pay off the debt if he chose to do so. It was, in fact, the necessary basis of a conversion of debt from a higher to a lower rate of interest.

---

[1] Moreover, part of the term for which the annuities were current had elapsed.

The most important plan of this period for redemption of the debt was put forward by Archibald Hutcheson, member of Parliament for Hastings. Hutcheson's proposal was, in fact, the forerunner of the numerous schemes, which have appeared under varying forms down to the present day, for a levy on property. These schemes rest fundamentally on a common assumption—that it is preferable to discharge the debt by a single effort spread over a short interval of time than to trust the uncertain operation of a sinking fund by which such redemption of debt as is actually achieved occurs over a very long period, during the whole of which taxation has to be levied for the payment of interest. It is argued that if it be granted that the levying of taxation, however scientifically imposed, is economically injurious, it is worth while making a considerable sacrifice once for all in order to escape from the burden. There are other considerations also which cannot be ignored. A country heavily taxed and anticipating the necessity of a heavy outlay in the future, on a war for example, might think it desirable to rid itself of its present burdens in order to be prepared for the emergency. Again, the possibility of a decline in wealth would indicate the necessity of removing, while prosperity endured, a weight of taxation which posterity might find itself incapable of supporting.

Hutcheson pointed out that there were three ways in which either an individual or a nation could pay off debt.[1] First, by surrendering a certain portion of capital; secondly, by securing through a policy of retrenchment "sufficient to answer the Yearly Interest and to sink the Principal in the Time they propose to do it"; thirdly, by borrowing at a lower rate of interest and applying the interest saved to a repayment of the capital.

---

[1] *Some Considerations relating to the Payment of the Public Debts* (1720).

Hutcheson declared his approval of the first method and argued that if it were adopted great benefits would be obtained. The revenue belonging to the Crown at the Revolution would be set free to meet the expenditure of a peace establishment and the land and malt taxes could be repealed. The customs and excise duties which had recently been imposed could also be abolished, and people would thus be enabled "to live at least 20 *per Cent.* cheaper than they at present do." Advantages would also be derived from the low rate of interest which would prevail after the debt had been discharged. The £50,000,000 of debt which "is now in the nature of a Mortgage on the Produce of the Lands, the Trade and Labour of the People of *Great Britain*, will then, instead of clogging, mix in and become the same Thing with the said respective Interest."[1] Moreover, the nation would rid itself of the obligation which then existed to foreign holders of British Government securities. Hutcheson believed that foreigners held not less than from five to ten millions and perhaps a great deal more of the National Debt. He knew that certain persons supposed that this borrowing "is an Advantage to this Nation, for that we gain more by Trading therewith, than the Interest we pay for the same,"[2] and that repayment would take the precious metals out of the country. He himself, however, regarded the payment of interest to foreigners as a sheer loss, and thought it desirable even at some sacrifice to repay them their principal. Finally, the nation would benefit politically from a redemption of the debt. It would enjoy "Real Safety and Security" and would be able to exert considerable influence abroad.

It might, however, be argued that a plan for the redemption of the whole debt would seriously injure certain interests. Hutcheson met this criticism by an analysis of the effects of the plan upon the different "interests" in England. The "landed interest," he maintained, would benefit through a rise in the value of land, the abolition of the land tax and the general cheapness of things. The "trading interest" would be assisted by the fall in the rate of interest which might be expected to occur. The consequences so far as the "monied interest" was concerned were rather more complex. "As to that Part which does not consist in Government-Securities they will be little, if any, Losers thereby."[1] They would save as much by cheaper living as they would lose by the reduction of interest. The position of the holders of public securities depended almost entirely on the question whether the exemption of the funds from all forms of taxation, which had hitherto been treated as an inviolable principle, should be observed without any qualification. Hutcheson was not anxious to settle this thorny problem.

---

[1] *A Collection of Treatises relating to the National Debts and Funds* (1721), p. 20.

[2] *Treatises*, p. 21.

> "Whether the Creditors of the Publick can be charg'd with any Proportion towards the Payment of the Debts due to themselves, without breach of Faith, I shall not take upon me to determine, but leave that Point to the Wisdom and Justice of the Parliament. But I crave leave to hint to those Creditors, That in Case of any publick Calamity or Distress, their Estates are, of all others, the most precarious, and contributing nothing to the Support of the Publick, are become extremely invidious, both to the Landed and Trading Interest; and indeed the Proprietors of such Estates, in respect of them, are as useless to the Government of *Britain* as any Foreigners whatsoever."[2]

The most satisfactory solution appeared to be that they should make a voluntary contribution. Nevertheless, although they "cannot justly be annually taxed for any Purpose whatsoever," there seemed to be no ground for exempting them from a general levy on property.

Hutcheson's actual proposals, first brought forward in 1714, were far-reaching.[3] The Land Tax of 1713 was to be made a perpetual rent-charge capable of being redeemed at any time by the proprietors at twenty-two years' purchase. For this purpose landowners were to be authorized "notwithstanding any Disability by Settlements to Sell so much of the said Lands as shall be sufficient to redeem the aforesaid Rent-Charges." A general levy of 10 per cent. was to be imposed on all personal estates in Great Britain. An annual tax of 10 per cent. was to be laid on "the Salaries and Perquisites of all Offices and Places." The sums received from these sources would be devoted to the redemption of the debt.

---

[1] *Treatises*, p. 22.

[2] *Treatises*, pp. 22–3.

[3] *A Proposal for the Payment of the Publick Debts*, 1714 (reprinted 1720).

Other measures, however, were also involved in the plan. Legal interest was to be reduced to 4 per cent. per annum, with the intention, no doubt, of effecting subsequently a conversion of debt to that level. To secure provision for such debts as were as yet unprovided for all funds granted for terms of years were to be made perpetual. Finally, as a substitute for the Land Tax, "an Excise on Apparel or some other Excise sufficient to produce One Million *per Annum*" was to be imposed until the whole debt should be redeemed.[1]

Hutcheson argued that the scheme could be carried out without any of the evil effects which might popularly be supposed to follow from it. The Capital of the country would not be destroyed: "some part indeed of the Property of particular Persons will receive new Masters; but the Property and Wealth of the Nation in general will still remain the same."[2] The "landed interest" would derive considerable benefit from the measure, though the greatest opposition would probably come from them.

The plan naturally did not receive sufficient support to enable it to be put into operation, and nothing was left for Hutcheson but to bestow his approval upon Walpole's arrangement. He advised the "monied interest," upon whose assent the conversion of debt largely depended, to remember that "their Estates are more exposed than any Others, to be affected by a Public Distress. . . . Should the Pretender ever succeed in any Attempt the Funds would fall the first Sacrifice to his Rage"; and he warned the fundholders that "their Estates contributing nothing to the Expence of the Publick, are become extremely Invidious, as well to the Trading, as the Landed Interest."[3]

Hutcheson's scheme obviously could not stand comparison, as a practical proposal, with the sinking fund of 1716–17. Nevertheless, on theoretical grounds, certain claims could be made on its behalf. The inclusion of a tax on incomes shows that considerations of equity were present, and that the scheme was not simply directed against the class of property holders. Again, while the fundholders were not to be exempted from the levy they were not, as in some later proposals of this sort, to be singled out for special attack. By some writers,[1] however, Hutcheson's plan has been criticized on the ground of injustice. It has been argued that the burden of the levy would have fallen mainly upon the owners of land and houses, and that property in money and stock in trade would have escaped. It is clear that certain disadvantages would be associated with a levy instituted at a time when modern forms of ownership had barely arisen, and when modern methods of taxation had not been adopted. If Hutcheson's proposal had been carried out, there is no doubt that injustices would have been created through difficulties of assessment and through lack of convenient instruments by which the payments could have been made.

---

[1] *Treatises*, p. 27. As soon as redemption of the debt had been achieved the nation should resolve to meet both peace and war expenditure without resort to borrowing.

[2] *Treatises*, p. 28.

[3] *Some Calculations and Remarks relating to the Present State of the Publick Debts and Funds*, pp. 28–9.

Hutcheson subsequently devoted his attention to the problem of the sinking fund.[2] He found that the total annual produce of the funds appropriated to the payment of the debt was £2,797,775 18*s*. 4*d*., and that the debt charge was £2,673,287 9*s*. The sinking fund was, however, considerably less than the difference between these two sums, and, if a calculation were made of the debts for which there was as yet no provision, would appear to be no more than £19,970 11*s*. 4*d*. It was clear that the existing sinking fund was quite inadequate: Hutcheson wanted to see a fund of £1,000,000 per annum which would, he reckoned, discharge the debt of £56,000,000 in thirty years' time on the assumption that a reduction of interest to 4 per cent. took place. By this reduction, however, only £557,776 could be secured and the remainder would have to be obtained by the imposition of a new tax; economies could probably not be introduced on a scale sufficient to yield the necessary £442,224.

---

[1] *e.g.* Hume, *Essay on Public Credit.*

[2] *Some Calculations and Remarks relating to the Present State of the Publick Debts and Funds*, 1720 (*Treatises*, p. 55).

Certain difficulties appeared, however, to lie in the way of a reduction of interest. Even the conversion of the redeemable debt might be supposed to depend solely on the consent of the proprietors, since "exclusive of them there cannot be found Numbers in the whole Kingdom sufficient to subscribe for so great a Sum, which is near, if not above, treble the Value of all the current Cash in the Nation." [1] Hutcheson believed, however, that the reduction could be achieved. The terminable annuities presented a much more unmanageable problem. Hutcheson suggested that they might be converted into redeemable annuities, the proprietors being offered twenty years' purchase for them. He reminded the annuitants that arrangements of this sort were already sanctioned by law in other departments of life. "May not the Houses of particular Persons be pulled down in Towns and Cities, for making the Passages from one Street to another more commodious, satisfying the Owners for the value of such Houses?" [2]

On the subjects of foreign holdings in the funds and of the relation of the debt to the Protestant succession Hutcheson offered some interesting comments. He declared that he had long thought it "extremely imprudent to incourage Foreigners to lend their Money on our Publick Funds . . . unless such Foreigners would have followed their Money, and spent the Income thereof in *Britain*." [3] He criticized the view taken with regard to the debt which was held internally, that the Protestants had advanced the money and that the Protestant succession was thus firmly established. He thought it might reasonably be assumed that a nation free from debt would be much better able to support the Hanoverian line. But he overlooked the retort that though better able it might be much less disposed to do so.

Hutcheson's proposals, though liable to a good deal of criticism, must be regarded as the most serious attempt made at this time to deal with the problem of the debt. Of the other plans that were published some were definitely inflationary in tendency. Thus Sir Humphrey Mackworth,[4] rejecting the three forms of debt redemption referred to by Hutcheson, suggested that the debt might be discharged by the issue of a paper currency.[1] Mackworth believed that in England " the Trade thereof is kept very low, and the Manufactures almost undone by the Scarcity of Silver " ; he therefore proposed that " a new Species of Money be made, by Authority of an Act of Parliament, of a Value equal with Silver and Gold, secur'd on all the Funds and publick Revenue of the Kingdom, for so much Money as the publick Debts shall amount unto." [2] With the help of this money, which was " to pass as the current Coin of the Kingdom in all Payments whatsoever," the debt was to be redeemed.

---

[1] *Treatises*, p. 78. [2] *Ibid.*, p. 80. [3] *Ibid.*, p. 82.

[4] Deputy Governor of The Corporation of Mine Adventurers of Great Britain.

The aim of Mackworth's proposals appears to have been almost entirely monetary. He was concerned with the view that " in *Great Britain* one Half of the People are not employ'd in Trade because, at present, Money is so scarce." He was also at some pains to show that no evil inflationary results would follow from the adoption of his policy. To the objection that any addition to the quantity of money in a country would cause it to be undervalued so that the same quantity of goods would cost twice as much as before, he replied that " Manufactures will be cheaper there, because in great Quantities " ; while even if the money were undervalued, the country would derive considerable advantage since " that Country would have the whole Benefit of the greater Quantity, and only bare Share of the lesser Value, according to the Proportion its Money had to the Money of *Europe*." [3]

In 1715 a plan of redemption was put forward which involved the conversion of funded into floating debt.[4] £2,000,000 were to be raised at 6 per cent. in order to provide the means for making to the Bank of England payment for the circulation of Exchequer Bills bearing 3 per cent. interest. When this arrangement had been carried out a sufficient quantity of Exchequer Bills would be issued to discharge the redeemable debt, except that portion of it represented by the original debt due to the Bank. The annual saving due to the substitution of Bills at 3 per cent. for funded debt might be reckoned at £462,454 10*s.* 5*d.*, which would be devoted to the redemption of the Bills. "Thus by the Use of two Millions for about 30 Years 20 Millions on the Perpetual Funds will be discharged."[1]

---

[1] *A Proposal for Payment of the Publick Debts.*

[2] *op. cit.* (3rd Edit.), p. 1.

[3] *op. cit.*, p. 16.

[4] J. Asgill, *An Abstract of the Public Funds, with an Essay for the more Speedy Redemption of the Perpetual Funds* (1715).

Lastly, the question of "taxing the funds" was considered.[2] By imposing a tax upon public securities it seemed that two important objects might be secured. First, the burden of taxation would be more fairly distributed. "The Landed Interest hath paid in thirty Years past about half as much again as their Estates are worth, for the support of the War; in which time the Monied Interest hath paid nothing at all." A tax of this sort, "in proportion to that on land," would yield £700,000, and would enable a war to be carried on without the imposition of any new taxes. Secondly, savings would be diverted from investment in public securities to investment in trade. "One great Reason of the Decay of Trade is the Merchants can make so large Interest on their Money in the Funds that they do not think it worth their while to run the Hazards of the Seas." But the "monied interest" would have no ground for complaint; they would still make 5 per cent. on their money in time of war and 5½ per cent. in time of peace. The chief difficulty in the way of such a proposal was of a constitutional nature. Since the funds had been expressly declared free from taxation, it might be supposed that a breach of Parliamentary faith was involved. The answer was that what Parliament had done it could undo, and that the measure would improve public credit by diminishing the necessity for borrowing. Nevertheless, it is clear that though Parliament might have raised loans in the future without any provision for tax exemption, taxation of existing securities would have been equivalent to a violation of contract. Taxation of the funds was not, in fact, realized until the Income Tax was imposed at the end of the century.

---

[1] For a similar proposal to convert the debt into currency notes bearing interest at a rate 1 per cent. below that on the converted security, *vide* Stephen Barbier, *An Expedient to pay the Publick Debts* (1719).

[2] *Reasons for Taxing the Public Funds* (1716).

Within a few years from the collapse of the South Sea Scheme a somewhat bitter controversy developed over the sinking fund. The lack of reliable finance accounts created a good deal of dispute as to the extent to which the debt had actually been reduced.[1] It was even maintained that the debt had increased between 1716 and 1725 by £7,764,037 15*s*. 1¾*d*.,[2] the amount borrowed during that period being supposed to have exceeded the amount paid off with the help of the sinking fund. The matter was brought before the House of Commons in 1728, where Walpole succeeded in getting drawn up a report which asserted that since 25th December 1716 the debt had been reduced by over £2,500,000.[3] The report referred to three methods by which debt redemption could be brought about: (1) An increase in the yield of taxes already imposed. (2) The imposition of new taxes. (3) Reduction of interest on the debt. The gain to be derived from the first method was evidently insufficient for the purpose of paying off debt. On the other hand, it was normally undesirable to add to the burden of taxation. Hence, relief must generally be sought from conversion of debt. Great advantages had been derived from the conversion of 1717, which had been made possible by the consent of the Bank and the South Sea Company. From the reduction of interest which then took place, and the consequent saving on the debt charge, the sinking fund had arisen; and though the fund at the outset amounted to only £400,000 per annum, it had since grown to £1,200,000 per annum, interest having been further reduced to 4 per cent. Thus the attitude of the fundholders had entirely changed. "The only Contest now among the Creditors of the Publick is that every one of them desires to be the last in the Course of Payment."

---

[1] Differences also arose over the capitalization of the terminable annuities and the date at which the sinking fund could be said to have originated.

[2] Cf. *A State of the National Debt* (1727); probably by Pulteney, afterwards Earl of Bath.

[3] *Journals of the House of Commons*, Vol. XXI, p. 121. The reduction was actually stated at £2,698,416 9*s*. 7¾*d*. Cf. also "The Commons Representation of the State of the National Debt," *Hansard*, Vol. VIII, pp. 650 *et seq*.

The total income of the sinking fund between 1718 and 1728 was as follows:[1]

	£	s.	d.		£	s.	d.
1718 . . .	569,505	4	11	1724 . . .	850,286	10	3
1719 . . .	1,324,175	0	0[2]	1725 . . .	1,225,141	8	0
1720 . . .	630,803	6	0	1726 . . .	786,818	12	11
1721 . . .	368,772	3	9	1727 . . .	1,284,586	2	5
1722 . . .	1,093,821	13	5[3]	1728 . . .	1,924,101	4	8
1723 . . .	2,673,291	4	5[4]				

In the first years of its existence the fund appears to have been devoted chiefly to paying off Exchequer Bills. But as early as 1722 it was employed for a purpose for which it was not originally intended, since it was then made collateral security for the interest on £1,000,000 of Exchequer Bills.[5] In 1724 £15,144 19*s.* was taken from it to make good the loss on gold coin.[6] In 1727 Walpole reduced the income of the fund by settling upon George II the entire revenues of the Civil List, which then yielded about £100,000 more than the sum (£700,000) hitherto placed at the disposal of the Crown. On the other hand, the fund gained by the reduction of the rate of interest to 4 per cent. on the debts due to the Bank and the South Sea Company in 1727, by which a saving of £402,205 16*s.* 5*d.* was effected.

Thus within ten years of its foundation some of the weaknesses of the fund had already been exposed. It was fed mainly by conversion operations on the debt, but obviously there was a limit to the amount which might be derived from this source. On the other hand, it was liable to suffer from minor additions to expenditure. Additional expenditure on a large scale might be met by an increase in the rate of the annual land tax. This tax was raised, for example, from two shillings in the pound to four shillings in the pound in 1727. But a minor increase, such as the addition to the Civil List, would be likely to be met not by the raising of rates of taxation nor by the levying of new taxes, but by appropriating the surplus which was intended to constitute the sinking fund. Against this diminution there could only be set the possibility of a gradual increase in the yield of the duties which formed the permanent revenue, an increase which would, other things being the same, add to the surplus available for the redemption of debt.

---

[1] P.I. & E., ii, 280–1.

[2] Including £500,000 contribution on the first lottery loan.

[3] Including balance of a loan from the South Sea Company (£234,122).

[4] Including repayment by South Sea Company of £1,000,000 loan in Exchequer Bills, and the issue of £1,000,000 Exchequer Bills to redeem five per cents.

[5] Cf. W. Fairman, *An Account of the Funds transferable at the Bank of England, also a History of the National Debt and Sinking Fund* (7th Edit.), p. 240. Brisco, *The Economic Policy of Robert Walpole*, p. 62.

[6] Fairman, *loc. cit.*; Brisco, *loc. cit.*; J. Grellier, *History of the National Debt*, p. 142.

The controversy over the sinking fund had revealed the fact that loans had been raised and debt created at the very time at which debt had been redeemed. Very little attention seems to have been devoted to the question of the desirability of maintaining financial arrangements of this sort. Nor was the problem a really serious one in the circumstances of the time, since borrowing occurred on a relatively small scale.

The question was, however, raised by Sir Nathaniel Gould in an *Essay on the Publick Debts of this Kingdom*, published in 1726. Gould appears, in fact, to have been the first person to have employed those arguments on behalf of the policy of simultaneous borrowing and repaying which subsequently became an accepted element in financial theory. The essay contained both an attempt to justify current debt policy and a scientific treatment of the problem of the sinking fund. Gould maintained that the debt had not increased between 1717 and 1724, but had been reduced by £2,106,149, the sinking fund having paid off during the period £2,941,071.[1] He argued that confusion had been largely created by the conversion of terminable annuities into South Sea Stock on terms less favourable to the Government than those on which they had originally been purchased ; but that the nominal addition to the debt which had thus arisen ought not to be regarded as a real increase. Gould had complete confidence in the permanence and the efficacy of the sinking fund. He regarded the arrangement on which the fund was based as part of a contract between the State and its creditors. The creditors had been induced to accept a reduction of the rate of interest

[1] *Essay*, pp. 31–4.

on the sums owing to them on condition that the saving obtained was applied to the discharge of the principal of the debt. Fears as to the misappropriation of the fund had therefore no foundation.

Gould defended the policy of simultaneous borrowing and repayment, and criticized the view that if loans were raised to an extent equivalent to the amount paid off no progress would be made in the redemption of the debt. He maintained that this view was untenable if it were granted that fresh taxes would be imposed to meet the interest on the sums borrowed. Thus a sinking fund increasing at compound interest would be "sufficient not only to discharge our present Debts but any probable Addition in the mean Time to be made to them by further Loans on new-invented Funds in a few Years after the present Debts shall be discharged."[1] A sinking fund of £1,000,000, which the country might expect to enjoy in the future, increasing at 4 per cent. compound interest, would be capable of paying off in 105 years a debt of 1,575 millions, an amount to which the existing debt would grow if 15 millions per annum were added to it. Gould therefore argued that it was better to meet an increase of expenditure by borrowing than by a diversion of the sinking fund from its proper purpose.

The nature of the sinking fund was clearly illustrated by Gould's essay. The fund was cumulative, since the saving of interest on debt redeemed would be devoted to the redemption of further debt. Tables displaying the operation of the principle of compound interest indicated that, if sufficient time were allowed, vast quantities of debt could be discharged. This was certainly not the first occasion on which the processes of a cumulative sinking fund had been examined. But Gould went further than this. He maintained that advantage could be derived from the repayment of debt even in a period during which sums had to be raised by loan. This thesis was rejected after the Napoleonic wars, during which the policy of borrowing and repaying resulted in such obvious loss as to bring general discredit upon the sinking fund which had been established. But Gould's view, though open to serious objections, avoided one of the chief fallacies into which popular discussion has sometimes blundered. He expressly stated that when fresh loans were raised taxation must be imposed to defray the charge of these loans. He was therefore not liable to the criticism that he ignored the fact that, while the repayment of debt was being carried out at compound interest, debt was being increased at compound interest. He did not maintain that by the simple operation of a mathematical principle the debt could be discharged.

---

[1] *Essay*, p. 40.

Nevertheless, the doctrine, though not technically fallacious, suffers from very obvious defects. The qualification that taxes must be levied in order to pay the interest on the sums borrowed reveals clearly the nature of the process of repayment. Debt can be repaid in spite of the necessity of contracting fresh loans provided that the nation is prepared to meet the charge of these loans. Ultimately, therefore, the sinking fund must rest upon resources derived from taxation. Although Gould seems to have been aware of this fact, he did not realize that it only marked the beginning of the problem, and that he had neglected to make any comparison between the disadvantages of increased taxation and the advantages of a reduction of debt.

In common with other writers who have advocated a cumulative sinking fund, Gould displayed a good deal of scepticism about the benefits to be derived from the conversion of debt to a lower rate of interest. An addition to the sinking fund from the savings to be obtained from a conversion would enable larger sums to be applied to the redemption of debt. But these larger sums would not accumulate so rapidly as they would have done had no reduction of interest been effected. It was doubtful, therefore, whether conversion would accelerate the repayment of debt. Gould argued that no attempt should be made to lower the interest on public securities until a careful examination had been made of the rate of interest on private loans. He also maintained that there was a danger, if the burden "sit so easy upon us," that the sinking fund might be diverted from its purpose of discharging debt.

The controversy in which Gould was engaged was mainly concerned with the actual facts as to the state of the National Debt. His arguments on behalf of a cumulative sinking fund were easily liable to be distorted. He pointed out in reply to a critic [1] that he had never recommended any addition to the debt " but upon an Occasion when it would be absolutely necessary to prevent the Misapplication of the Sinking Fund." In general, however, Gould's doctrines seem to have escaped attack, and they could be repeated half a century later as though they were the essence of financial wisdom.

The first [2] serious attack upon the sinking fund occurred in an indirect manner. The surpluses which were carried to the fund in order to be applied to the redemption of debt were not used for current expenditure. But a violation of the fund could equally take place if these surpluses were employed as a basis on which fresh loans were to be raised. Thus in 1730 the salt duties on which the East India Company's debt was charged were repealed, and the charge was transferred to the surpluses of the Aggregate Fund. The inconsistency of Walpole's financial policy was revealed when the salt duties were restored two years later and a loan of £500,000 was raised upon them.

In 1733, however, Walpole proposed to apply £500,000 out of the sinking fund to the service of the year. He had secured a reduction of the land tax from 4*s*. in the pound in 1727 to 3*s*. in 1728, 2*s*. in 1730 and 1*s*. in 1731. He was anxious to maintain the tax at this level, since he did not wish to incur the hostility of the owners of landed property. The final reduction of the tax to 1*s*. in the pound had meant a sacrifice of revenue of approximately £500,000,[3] and the simplest way of recovering this sum was by a diversion of a portion of the income of the sinking fund.

Walpole was violently attacked by Pulteney, who pointed out that this was not the first time that the fund had been raided, and referred to the sum taken from it and applied to the Civil List and to the repeal of the salt duties. Barnard declared that the proposal amounted to robbing posterity in order to obtain " a trifling present ease for ourselves."

---

[1] *A Defence of an Essay on the Publick Debts of this Kingdom.*

[2] In 1727 £370,000 was borrowed on the surplus of the duties on coals and culm which presumably ought to have gone to the fund: in 1729 £1,250,000 was borrowed on surplus duties. Cf. Brisco, *op. cit.*, p. 63.

[3] Cf. Dowell, *History of Taxation*, Vol. II, p. 96.

Wyndham ridiculed Walpole's policy with regard to the land tax and the salt duties.

> "I do not think," he said, "we can trust ourselves. The salt duty was taken off as a tax the most grievous to the labourer and to the poor of this nation and the Sinking Fund was thereby diminished. . . . But that very tax was again laid on, because some gentlemen pretended to have found out that the landed gentlemen of England were poorer than the poor." [1]

Controversy developed chiefly, however, round the question of a breach of faith. Walpole maintained that although the sinking fund had been established for the payment of the public debts, it still remained at the disposal of Parliament. Parliament could therefore apply it to current services without incurring the charge of a breach of faith with the fundholder. It could be shown without much difficulty that no contract had been made between the State and the public creditor by which the latter had been guaranteed repayment of his principal.[2] Moreover, the situation had completely changed. The public creditor no longer desired to be repaid. Thus, in 1730, "the *Sinking Fund* was now grown to a great maturity, and produced annually about £1,200,000 and was become almost a terror to all the individual Proprietors of the Publick Debts." [3] Hence Parliament had turned its attention to the remission of taxation and the salt duties had been abolished.

On the other hand, Walpole's proposal had created alarm concerning the control of the sinking fund. If the surplus of the various duties which had been granted in perpetuity were to be misappropriated in this arbitrary manner in spite of the clear intention of the Act of 1716, the Government of the day would be to some degree financially independent of Parliament. It might apply surpluses over which Parliament had no control to purposes of which Parliament strongly disapproved. Pulteney declared that "the *Sinking Fund* is at present left, without any proper Checks or Regulations, as an accidental Appendix only to the Office of the *Treasury*; although it is, in the most peculiar Manner, the Property

[1] *Hansard*, VIII, 1213.

[2] Cf. *Some Considerations concerning the Publick Funds, the Public Revenues and the Annual Supplies* (1735).

[3] *op. cit.*, p. 56.

of the *Kingdom*, not of the *Crown*."[1] Clearly these fears had a good deal of justification. There is a very natural temptation for Finance Ministers to regard sinking funds as reserves which can be used for extraordinary expenditure.[2] Where the sinking fund depends upon supplies voted annually the temptation is held in check; but a fund based on this sort of arrangement is unusual. Normally the sum to be applied to the redemption of debt is either rendered a permanent charge on the budget or is based upon taxes which have been made perpetual. Thus the very provision which is intended to secure continuity of policy furnishes the means by which a Government may free itself from the necessity of obtaining supplies from Parliament.

The sinking fund had been damaged beyond repair; its misappropriation now became a regular feature of financial policy. In 1734 £1,200,000 was taken from the fund for current services; in 1735 its income was anticipated.[3] This practice was continued henceforward with little interruption.[4] From time to time loans were charged upon the fund: in 1752, however, it was provided that the duties imposed to meet the charge of fresh debt should be carried to the sinking fund and the annuities granted should be paid out of it. The original function of the fund was not entirely lost and debt was still paid off with its assistance, but the policy of systematic redemption had been definitely abandoned.

It was not unnatural that economists in the latter half of the century should regard the policy adopted in 1733 as evidence of the impermanence of sinking funds. "During the most profound peace," Adam Smith remarked forty years later, "various events occur which require an extraordinary expence and government finds it always more convenient to defray this expence by misapplying the sinking fund than by imposing a new tax."

[1] *An Enquiry into the Conduct of our Domestic Affairs* (1734), p. 14.

[2] For the treatment of the sinking fund as a war fund see p. 129.

[3] £1,000,000 was to be issued from the fund for the service of the year, power being taken to borrow upon it whatever was required to make up this sum.

[4] Brisco (*op. cit.*, p. 70) estimates that between 1733 and 1741 £6,700,000 was taken from the fund for current expenses and £1,800,000 borrowed on it for the same purpose.

CHAPTER III

CONSOLIDATION. THE ORIGIN OF THE STOCKS

In its origin the sinking fund had been associated with a conversion of debt. The surplus which was to be devoted to redemption had been derived from a reduction of the rate of interest on public securities. But there was obviously no necessary connection between these two methods of dealing with the debt. Hence, although the sinking fund had practically disappeared as an effective means of debt redemption after 1733, some relief might still be expected from a reduction through conversion operations of the annual charge.

In 1737 the rise in the price of the stocks led Sir John Barnard to bring forward certain proposals for the reduction of the debt. The prices of the Three Per Cents., South Sea Annuities and India Stock were as follows : [1]

Date	3 per cent.	4 per cent. South Sea Annuities	India Stock
January 1737 . .	103¾	111¾	177½
February ,, . .	105⅜	113	179¼
June ,, . .	107	—	—

Barnard argued that the time had come to repeat the operation of 1717 and to reduce the rate of interest to 3 per cent. on those stocks which bore a higher rate than this.[2] He maintained that the nation would derive considerable advantages from a fall in the general rate of interest, and that "if the interest of money be continued for any number of years at the present rate in this kingdom," a rate higher than that prevailing in countries which were its rivals, there must be a "gradual decay of our navigation, foreign trade and home manufactures." But he held that it was impossible for the "natural" or the "legal" rate to be lowered until the rate on public securities had been reduced.

[1] Cf. Grellier, *History of the National Debt*, p. 187.

[2] *Hansard*, Vol. X, pp. 72–93.

Barnard proceeded to argue that the operation was perfectly possible. The Government was now borrowing at 3 per cent. and the 3 per cent. securities stood at a premium. Moreover, the gain to be derived from the policy which he proposed would be large and the sinking fund would be raised to £1,400,000 per annum, "to be applied only towards redeeming the capital of our several trading companies." He admitted that the small proprietor would feel the reduction. But the heavy burden of taxation had also to be considered. There was also the consolation that "the only great sufferers will be those who can very well bear it, I mean our overgrown rich stockholders, most of whom do not near spend their yearly income from the funds." As to the small people, "no one of them can be utterly undone."

At first conditions appeared favourable to this measure. The House of Commons passed a resolution "that all the public funds redeemable by law which carry an interest of 4 per cent. per annum be redeemed according to the respective provisoes or clauses of redemption contained in the Acts of Parliament for that purpose, or be converted into an interest or annuity not exceeding 3 per cent. per annum, not redeemable till after fourteen years." Barnard's scheme involved, in fact, three alternatives: (*a*) Repayment, (*b*) Annuities for terms of years or for lives, (*c*) Interest at 3 per cent. on a capital not redeemable for fourteen years. In case the holders of the 4 per cents. (Old and New South Sea Annuities) refused to be converted, money would be raised on terms of (*b*) or (*c*) in order to repay them. A bill was drawn up on these lines and was read twice in the House.

In a rather violent pamphlet Barnard proceeded to develop still further the arguments in favour of a reduction of interest.[1] He maintained that this reduction would produce two important economic advantages. On the one hand, "One *per Cent.* saved on the Publick Debt due to *Foreigners* is so much Money . . . actually saved the Nation." On the other hand,

---

[1] *Reasons for the Representatives of the People of Great Britain to take Advantage of the Present Rate of Interest for the more speedy lessening the National Debt* (1737).

Cf. also *Considerations upon a proposal for lowering the interest of all the Redeemable National Debts to Three Per Cent. Per Annum* (1737).

"By One *per Cent.* being saved on all the *Redeemable Debts*, so much Money as that shall amount to, there will be *less* to be raised by *Taxes* on the People of *Great Britain.*" Without much attempt to explain how the policies of tax reduction and debt redemption could be pursued at the same time, Barnard also claimed that the saving of interest, if applied regularly to redemption, would be sufficient to pay off the whole debt in forty-seven years.

Barnard strongly emphasized the conflict of interest which the debt had introduced into the State. "To speak *properly* the Publick Funds divide the Nation into *two* Ranks of Men, of which one are *Creditors* and the other *Debtors.* The *Creditors* are *the Three Great Corporations* and others, made up of *Natives* and *Foreigners*; the *Debtors* are the *Landholders*, the *Merchants*, the *Shopkeepers*, and all *Ranks* and *Degrees* of Men throughout the Kingdom."[1] The whole nation could, in fact, be divided into these two classes; but the distinction should not be allowed to continue, since it was the basis of the opposition to the proposed conversion of debt, which was clearly in harmony with the general interests of the country. The idea that the debt ought not to be paid off, on the ground that the stability of the Government depended upon its existence, should be repudiated. It has to be shown "that the *Publick Creditors* are *stronger* and *more in number* than those concerned in the *Payments* to the *Publick.*"

At this point, however, opposition developed. The holders of the public securities—chiefly, it must be supposed, the South Sea Annuitants—were evidently determined to resist the measure,[2] and Walpole, who had originally lent his support to Barnard's proposals, now turned against them. In opposition to Barnard it was urged that interest might be too low as well as too high, for if people could make only a small return on their capital, incentives "to carry on trade or manufacture farther than was absolutely necessary for daily and immediate subsistence" would largely disappear. Moreover, too low a rate of interest was an encouragement to luxury and extravagance. Along with these views, however, Barnard's critic rather inconsistently maintained the proposition that a low rate was a consequence of a flourishing trade.

---

[1] *Reasons*, p. 3.

[2] Coxe, *Memoirs of Walpole*, Vol. I, p. 499, says that Barnard's motion "was principally defended by the landed, and resisted by the monied interest."

The lowness of interest in Holland, it was explained, was due chiefly to the fact that "their chief fund is money" whereas "our chief fund is land"; nor should it be forgotten that the majority of people in Holland "live more precariously than do ours." Those who referred to the lowness of the rate of interest in Holland should reflect that if we reduced the rate on our public securities, the Dutch would withdraw their money from the country. Nor could such a withdrawal be regarded without alarm, since it might be supposed that the Dutch had about ten millions invested in the Funds.

Finally, however, the dispute was made to turn on moral issues. The holders of the various securities in question had refrained at a critical period from demanding repayment. Was the service which they had rendered to their country to be now rewarded by a compulsory reduction of their dividends? "The preference given to the funds," said Walpole, "arises from various causes: from the facility of receiving interest, cheapness of transfer, and from none more than the faith placed in the national honour, which is bound to suffer no loss to fall on the public creditor."[1]

This extraordinary argument was reinforced by an appeal on behalf of the small proprietor and of the widow and orphan whose money was held on trust. A report was ordered to be made to the House as to the number of such persons and their holdings. The figures were:[2]

(1)	Number	Quantity of Stock £	s.	d.	
Persons not holding more than £1,000 of Stock	7,760	3,033,754	15	1	Old South Sea Annuities
	8,436	2,736,764	0	11	New ,, ,, ,,
	17,196	£5,770,518	16	0	

---

[1] *Hansard,* Vol. X, p. 184.

[2] *Commons Journals,* XXII, p. 827.

(2)	Number	Quantity of Stock			
		£	s.	d.	
Quantity of Stock held by Executors, Administrators and Trustees	3,423	5,679,306	19	0	Old South Sea Annuities
	2,828	2,717,946	18	10	New ,, ,, ,,
	6,251	£8,397,253	17	10	

Finally, Walpole defended himself from the charge of inconsistency. "This Scheme," he declared, "is compulsory, mine was optional. . . . My Scheme laid the foundation, this reverses the whole system of the Sinking Fund." [1]

Undoubtedly Barnard's intention was to apply the savings to be derived from his conversion not to the sinking fund but to the relief of taxation. He declared himself convinced that the sinking fund "will never be religiously and regularly applied to the uses for which it was intended; but will always serve as a fund for leading the nation into expensive and unnecessary projects or measures." [2] On the other hand, great benefits would be secured if the advantage were taken of the reduction in the debt charge to abolish "some of the heavy taxes that oppress our poor labourers and manufacturers." Barnard's appeal was met with the answer that taxation in England was not so burdensome as it was in those countries which were her chief rivals in trade. In France and Holland "their taxes are more heavy in proportion to their riches than in this country, and their method of raising taxes is more arbitrary and more oppressive."

The failure of the scheme seems to have been brought about solely by the opposition of the fundholders. Probably the wealthier members of this class, who would then have been described as the "monied interest," played the chief part in this opposition. But the unpopularity of Barnard and the treatment which he received show that the hostility of the general body of fundholders had been mobilized against his proposals. There appears, indeed, to have been no other occasion in English financial history on which conversion proposals have been defeated simply by the resistance of the holders of public securities. The explanation lies apparently in the altered nature of these securities. Barnard was attempting to reduce the rate of interest on the debt due to the members of a corporation; modern conversions have dealt with an unorganized group of persons, the public creditors.

---

[1] *Hansard*, Vol. X, p. 185.

[2] *Ibid.*, Vol. X, p. 163.

A conversion which would have secured a considerable saving was thus postponed for a period of thirteen years. War broke out in 1739 and continued with little interruption until the treaty of Aix-la-Chapelle in 1748. Money was raised either on 4 per cent. or 3½ per cent. securities, or on securities bearing only 3 per cent. interest but possessing the added attraction of a lottery.[1] The debt had amounted in 1738 to £46,275,038; by 1749 it had reached £77,125,617.[2]

Largely as a result of the war an important change was introduced into the character of the National Debt. Hitherto it had consisted largely of the obligations of the State to the three great companies—The Bank of England, The South Sea Company, The East India Company. Of these the Bank of England had come to occupy the most prominent position. The services which it rendered to the State, in the management of part of the funded debt, in the provision of credit and in the administration of the floating debt, could scarcely be provided by any other body. It had also profited by the eclipse of its chief rival, the South Sea Company. Nevertheless, although the South Sea Company had lost the position which it once occupied, the debt due from the State to it was much larger than that due to either of the other corporations. This debt had undergone two changes since the collapse of 1720–1. In 1723, the capital of the Company, amounting to £33,802,203, had been divided into two equal portions, one portion representing the trading capital, the other portion being described as the "Joint Stock of South Sea Annuities." In 1733 a further subdivision was introduced, three-quarters of the trading capital being converted into a joint stock with interest at 4 per cent. (the New South Sea Annuities). At the time of Barnard's conversion proposal the whole of these annuities were at 4 per cent., since the "Old South Sea Annuities" of 1723 had been converted from 5 per cent. to 4 per cent. in 1727. Although large amounts of debt due to the Company had been redeemed between 1731 and 1738, its claims still represented a considerable proportion of the total National Debt.[1]

---

[1] In some cases a life annuity was also added.

[2] P.I. & E., ii, 300–2.

During the war of 1740–8 the policy of borrowing on perpetual annuities from the outside public without the interposition of the Companies was enormously extended. By the end of the war a large volume of such 4 per cent. and 3 per cent. annuities was in existence. The debt to the Companies had certainly not increased in the same proportion. The Bank of England had advanced to the Government in 1742 without interest, in return for a continuation of their banking privileges, the sum of £1,600,000, and in 1746 they had cancelled £986,800 of Exchequer Bills, receiving in exchange an annuity of £39,472. The East India Company had lent £1,000,000 at 3 per cent. in 1744. No loans had been raised from the South Sea Company. The remainder of the sums borrowed for the purpose of financing the war had been obtained without any assistance from the Companies. Thus the funded debt in 1748 was distributed in the following manner : [2]

	£
Debt due to the Bank of England . .	11,686,000
Debt due to the East India Company .	4,200,000
Debt due to the South Sea Company .	27,302,203
Civil List Debts	1,000,000
Perpetual Annuities	25,609,701

In 1749 proposals for conversion were again brought forward. The occasion chosen, however, hardly appeared suitable for a measure of this sort. A war had just closed and loans were being raised at 4 per cent. In 1748 a loan of £6,300,000 had been raised at 4 per cent. with an addition to the capital of £10 per cent. ; in 1749 £3,072,472 in Navy Bills were funded at 4 per cent. It appeared unlikely that a proposal to convert 4 per cent. securities to 3 per cent., which had been defeated in a period of prolonged peace, should now be successful. Some encouragement might, however, be derived from a consideration of the prices of securities which had risen on an extensive scale since the termination of the war. The following changes had occurred in the prices of the 4 per cents. and 3 per cents.:

---

[1] In 1748 the debt to the South Sea Company was £27,302,303 out of a total debt of £79,293,713 ; cf. Hamilton, *An Inquiry concerning the National Debt* (3rd Edit.), p. 94. £6,500,000 of South Sea Stock and Annuities were paid off between 1727 and 1737.

[2] Cf. Hamilton, *loc. cit.*

	4 per cents. South Sea Annuities		
	Old	New	3 per cents.
March 1748	90¼	85¾	74⅞
May ,,	99	99¼	89¼
October ,,	101½	99¾	89½
January 1749	100¾	99¾	90¾
June ,,	106⅛	106¾	100
October ,,	108¼	107¼	102⅜

The Conversion Scheme was introduced by Pelham, the Chancellor of the Exchequer. The holders of the 4 per cents. were offered a 4 per cent. security until December 1750; after that date the interest was to fall to 3½ per cent. until December 1757, when it was to be reduced finally to 3. The Bill containing these proposals became law on 20th December 1749, and the holders of the 4 per cents. were required to give notice of their intention of accepting the offer by 28th February 1750. The time allowed was probably too short, and by 28th February holders of only £38,806,996 of stock out of a total of £57,703,475 had accepted the offer. Another Act was passed in 1750 modifying the terms of the offer and making them less favourable to the holders of the securities. Interest was to be reduced from 3½ to 3 per cent. from December 1755. After this second Act only £3,290,042 of stock, belonging chiefly to South Sea Annuitants, remained to be paid off. Part of the sum required was borrowed from the Bank and the rest was obtained by a loan of £2,100,000 at 3 per cent. raised in 1751.[1]

The following table shows the result of the conversion:[2]

	Stock converted		Stock paid off at par
	Under first Act	Under second Act	
	£	£	£
Bank Stock	8,486,800	—	—
India Stock	—	3,200,000	—
South Sea Stock	—	3,662,784	—
South Sea Annuities	15,335,740	6,026,785	2,276,894
Bank Annuities	14,857,956	2,713,618	830,898
Annuities chargeable on Plate Duties (1720)	126,500	3,250	182,250

---

[1] These 3 per cent. annuities were transferable at South Sea House and were grouped with the South Sea Stock and Annuities.

[2] *Parliamentary Papers*, 1890–1, XLVIII, p. 665.

The saving in the annual charge amounted to £272,067 from 1750 to 1755, £350,101 from 1755 to 1757, and £544,134 from 1757 onwards.

The conversion had thus proved almost completely successful. By far the larger part of the holders of the 4 per cent. securities had consented to a reduction in the rate of interest, and it had been possible to raise a loan at 3 per cent. to pay off the dissentients. Such a success could hardly have seemed probable in 1749 in view both of the previous unsuccessful attempt and of the recent termination of the war. Moreover, there was no suggestion that the gain to be derived from a reduction in the rate of interest should be applied to the redemption of debt. It had been thought at the time of the conversion of 1717 that the public creditors would be more easily induced to make the necessary sacrifice if it were pointed out to them that the sums gained by the reduction in the rate of interest would be devoted to repaying the capital that was due to them. What influence considerations of this sort actually had it would be difficult to determine, but it is fairly clear that in the course of time they came to play an increasingly smaller part. Walpole declared in 1733 that the attitude of the public creditors had completely changed, and although his views were expressed in defence of his policy of raiding the sinking fund, there was probably a good deal of justification for his statement that the competition between the creditors "is not now which of them shall be first paid, but which of them shall be last paid." It is therefore highly improbable that the holders of public securities would have felt any additional inducement to convert in 1749 if they had been informed that the saving on the debt charge would be applied to the repayment of the capital of the debt.

Nevertheless, a feeling certainly existed that to apply the saving in the annual charge to a reduction of taxation was hardly consistent with the maintenance of public credit. The first conversion in British finance—that of 1717—had been associated with the institution of the sinking fund. Thereby a connection seemed to have been established between conversion and debt redemption. The idea of devoting the saving on the debt charge to a repeal or reduction of taxes was new; and although the abuse of the sinking fund had made people familiar with the notion of a permanent debt, the principles of sound finance seemed to suggest that the gain arising out of Pelham's conversion ought not to have been thrown away on the taxpayer.

The conversion had an effect not only upon the debt charge but also upon the character and composition of the debt itself. Among the debts liable to conversion were certain annuities administered by the Bank which amounted to £18,402,472. These annuities were reduced, by the repayment of dissentients, to £17,571,574, and were subsequently consolidated into one stock—the 3 per cent. Reduced. This stock became within a short period one of the two principal securities in the British National Debt.

In 1751 a consolidation of debt took place which led to the creation of another big stock—the 3 per cent. Consols. This consolidation dealt with certain 3 per cent. annuities, the earliest of which dated from 1731. The consolidated stock amounted to £9,137,821. "Consols," though at the outset smaller than the 3 per cent. Reduced, had by the end of the century surpassed them in size and had become by far the most important element in the National Debt.

The changes thus introduced into the character of the debt were considerable. The creation of stocks in which for the future borrowing would almost exclusively be carried out clearly affected the position of the three great companies by whom hitherto the debt had been supported.

The Bank of England had probably gained by the alteration which had occurred. Its position depended very largely on the facilities which it provided in making temporary advances to the Government and in administering the floating debt. These activities could not be directly affected by any measure dealing with the consolidation of the Funded Debt. On the other hand, it gained in so far as it was concerned with the management of that Debt. Since 1714 the Bank had been entrusted with the payment of certain annuities,[1] and this function developed considerably after the collapse of the South Sea Scheme. By 1749 it managed almost the whole of those annuities which were subsequently formed into the 3 per cent.

---

[1] The payment for this service was at first made to the Chief Cashier and his Accountant, after 1750 directly to the Bank.

Reduced and the 3 per cent. Consols. After the creation of these stocks it was entrusted with the entire management of the payments and transferences connected with them, for which it received compensation at the rate of £562 10*s*. per £1,000,000.

The South Sea Company, whose position had been undermined by the events of 1720–1, ceased henceforward to play any part in the treatment of the debt. The Company became a purely passive body concerned only with the payments due to the holders of South Sea Stock and Old and New South Sea Annuities.[1] Of its position after the middle of the eighteenth century it has been said: "a corporation consisting of a governor, a sub-governor, a deputy governor and twenty-one directors had no further reason for its existence than a joint ownership of a government debt, and no other function than to trade in this debt and to carry out the technical duties connected with the payments."[2] Nevertheless, the Company was not dissolved, and even at the close of the century the possibility of introducing competition between it and the Bank was considered. In 1797 a report to the House of Commons, after having discussed the question of the dissolution of the Company, suggested:

> "it may also become a question of great importance to the public interest, if the South Sea Company should prefer the continuance of its present corporate capacity, whether it may not be enabled under its present Charter to lessen the public burthens by taking under its management any future augmentations of the Public Debt and transacting the necessary Transfers and Payments of Dividends at a lower rate of allowance than the Bank of England may at any time be willing to accept."[3]

But the part played by the Bank in the management of the debt had by this time attained such importance that, however exorbitant its charges might be,[4] its position was practically impregnable.

---

[1] These holders were finally paid off by Gladstone in 1854.

[2] Cf. Philippovich, *op. cit.*, p. 130.

[3] Cf. Philippovich, *op. cit.*, p. 131.

[4] A uniform rate of £450 per million was fixed in 1786, but with the growth of the debt a new arrangement was obviously required. A settlement was reached in 1808, when the following terms were agreed upon:

The East India Company also ceased, after the reduction of the interest on the sums owing to it to 3 per cent. in 1755, to have any connection with the extension of the funded debt. Between 1767 and 1777 it was called upon to make large advances to the Government, but these advances formed no part of the permanent debt of the country. Finally, in 1793 the remainder of the debt due to it was consolidated with the 3 per cent. Reduced, and this arrangement was treated as a redemption of the liability of the State to the Company.

A great change had thus taken place, through the creation of the Stocks, in the organization of public credit. Hitherto the State had been largely dependent upon the assistance of the three companies for the resources which it required. Partly through the interposition of their own credit and partly in consideration for the privileges they received, they had enabled the Government to borrow more cheaply than it could have done without their help. They had played a very large part in laying the foundations upon which the debt was established. But the time had now come for the State to free itself from their influence. The credit of the British Government was sufficiently secure for it to be able to borrow from the public on the most favourable terms that could be secured under the conditions of the time. It could draw not only upon the money market of London but also upon that of Amsterdam. Its funds provided a degree of safety for the investor which he could scarcely have discovered in the public securities of any other country. Nor were the companies as they existed in the middle of the eighteenth century capable of rendering in connection with the funded debt those services which they had performed at an earlier period. There was very little possibility, since the collapse of the South Sea Company, of stimulating competition between the companies to the advantage of the State. Moreover, the privileges which had been granted to the Bank and to the East India Company were so

(*a*) If the debt exceeded £300,000,000 the rate should be £450 per million.

(*b*) If the debt exceeded £400,000,000 the rate should be £340 per million.

(*c*) If the debt exceeded £600,000,000 the rate should be £300 per million.

extensive that any opportunity for increasing these privileges on condition of their making advances on favourable terms had ceased to exist.[1] Finally, the business of the most important of the three companies, the Bank of England, was definitely connected with the provision of short-period credit, in which it maintained its chief link with the finances of the State; in the matter of the funded debt its functions had necessarily become purely those of management.

---

[1] Something could, however, be got out of them on a renewal of their charters.

CHAPTER IV

THE SEVEN YEARS WAR AND THE WAR OF INDEPENDENCE

The association between British war finance and the funding system was definitely established in the course of the eighteenth century. In the earlier part of that century, in spite of the misuse of the sinking fund, it would not have been absurd to have supposed that within a short time, given the necessary effort on the part of the nation, the whole debt could be redeemed. The Seven Years War and the War of Independence, however, ultimately raised the capital of the debt to such a figure as not only to make complete redemption appear almost impossible, but also to create fears of a public bankruptcy.[1]

In the calmer atmosphere of a post-war period some attention is usually paid to the question, how far should the financial burden of a war be shifted on the shoulders of posterity. If the war is financed by taxation, the cost clearly falls upon the generation which wages it, though posterity probably suffers indirectly through the diminution in the provision which its ancestors have made for the future. If borrowing is employed, the cost is felt in the taxation which has to be raised in order to pay the interest on the debt. And this cost has to be met whether the sums are borrowed from nationals or foreigners. The doctrine that in the case of an internal loan all that is involved is a transfer of wealth from the taxpayer to the public creditor entirely misunderstands the nature of the transfer. A person who has borrowed for some productive outlay may be said to make a transfer of wealth in the shape of interest to his creditor. But the wealth which he transfers is roughly equivalent to the advantage which he derives from the use of the capital he has borrowed. In the case of the ordinary public debt the situation is normally quite different. It can hardly be said that the capital which has been devoted to the manufacture of guns and explosives has increased the taxpayer's capacity to pay. It may, indeed, have prevented his country from being overrun by the enemy, and it may have opened out a foreign market which was previously closed. But it will more probably have caused dislocation, disturbance and general impoverishment. Hence a public debt incurred for war expenditure is normally regarded as a definite burden on a nation.

---

[1] It may be noticed, however, that Hume had expressed such fears as early as 1752.

During the actual progress of a war, however, the question of how far the burden should be shifted on to posterity hardly ever assumes any degree of importance. The situation is one in which a considerably increased volume of public expenditure has suddenly become unavoidable; revenue from ordinary sources is no longer adequate and funds have to be obtained by borrowing. Political considerations also play their part. The popularity of a war depends to a considerable extent on the methods by which it is financed, and hence the policy of meeting even the larger proportion of the costs out of taxation is often impracticable.

During the years 1755–65 the following debt was incurred: [1]

Sums Borrowed £	Capital Funded £	Interest £	Annuities £
57,965,553	59,195,553	2,078,102	282,000

A comparison of the amount borrowed with the capital funded shows that the liabilities of the State were very little increased beyond the sums actually received on the loans that were raised. The policy which was carried out on a fairly extensive scale during the War of Independence, whereby the increase in the capital of the debt far exceeded the sums raised, had not yet been adopted. That policy was due to the practice of borrowing mainly in 3 per cents. when the return offered on money invested was 4, 5 or even 6 per cent. How, then, was it possible that this result was avoided in the Seven Years War, although borrowing took place solely in 4, 3½ and 3 per cent. securities?

The financial methods employed in the years 1757–63 were undoubtedly far less expensive to the State than the methods employed between 1776 and 1781. An exact comparison cannot be drawn because, even assuming similar methods to have been adopted, the terms on which loans would have been secured during the Seven Years War would have been cheaper than those on which they would have been raised during the War of Independence. Nevertheless, the methods pursued during the earlier war appear to have been less extravagant than those which Lord North practised during the war with America.

---

[1] Cf. Hamilton, *An Inquiry concerning the National Debt*, p. 88.

Conditions were not, however, sufficiently favourable during the Seven Years War to enable the State to borrow the sums it required simply by the issue of a 3½ or 3 per cent. security at par. In every case some additional advantage was offered besides the interest on the funded capital. This additional advantage usually took the form either of the right to participate in a lottery or of a long annuity.

Lotteries had for some time been a favourite device of British finance ministers, who used them chiefly in connection with the negotiation of loans.[1] It was anticipated that persons who would not be prepared to subscribe to the ordinary public loan at 4 or 3 per cent. would be tempted to do so if the bait of a lottery were attached to it. In England the State attempted to secure a monopoly of the lottery business for itself.[2] Laws were passed with the purpose of suppressing private lotteries, while the State continued to issue lottery loans or to introduce loans with lotteries attached. Moreover, after the termination of the Seven Years War a conversion and three redemptions of debt were achieved with the help of lotteries. In 1770, in order to secure the conversion of certain 4 per cents. (consolidated in 1762) into 3 per cent. Consols, the holders were offered as an inducement, for every £100 subscribed two tickets in a lottery at £14 each, on payment of £10 each by instalments. In 1772 the holders of £1,500,000 of 3 per cents. who agreed to accept £90 cash in payment of £100 stock became entitled to four tickets of £12 10*s*. each in a lottery; while in 1774 holders of £1,000,000 of 3 per cents. who took

[1] *Vide supra*, pp. 8, 17.

[2] Cf. J. Ashton, *A History of English Lotteries*, pp. 49–51.

£88 cash in payment of £100 stock were entitled to six tickets of £12 10*s*. each in a lottery. In 1775 the same terms were offered as in 1774. The system continued until 1784, when the policy of associating lotteries with loans was abandoned, and the lottery was used from year to year simply as a means of raising revenue.[1]

Thus in 1758, for example, a loan of £5,000,000 was raised, £4,500,000 of which were funded in 3½ per cent. annuities, the remaining £500,000 arising from a lottery of 50,000 tickets offered to the subscribers. But the State did not receive the profits of the lottery : the £500,000 represented by the lottery tickets were also funded in 3 per cents.[2] In 1760 the lottery of the year brought about an increase in the capital of the debt beyond the sums actually raised by the loan. £8,000,000 were raised and the subscribers received for each £100, in addition to £100 stock, a further £3 representing the funding of a lottery ticket and bearing interest at 4 per cent. for twenty years and afterwards 3 per cent. Thus £8,240,000 of 4 per cent. stock were created.

From 1760 onwards a further attraction was added in the form of a long annuity. A loan of £12,000,000 raised in 1761, with a lottery of £600,000 attached to it, provided that for every £100 received the subscriber should be entitled, in addition to his 3 per cent. stock, to an annuity of £1 2*s*. 6*d*. for 99 years. The policy of introducing long annuities into the loans that were negotiated was continued until 1835, the terms being so arranged that the annuities should expire in 1860.

The methods of funding adopted at this time differed in some important respects from those which were employed in subsequent wars. Although Consols and Reduced Threes had been created, they had not yet attained the position which they occupied at the close of the century. During the Napoleonic Wars their size and the preference for them over the other stocks were so marked that it was admittedly cheaper to borrow in them. During the Seven Years War, however, their priority was not so obvious. Loans were then raised on 4 and 3½ per cent. annuities on condition that the rate should sink to 3 per cent. after a given period.[1] Thus two quite distinct arrangements characterize the borrowing operations of these years. First, there appears to have been no clear advantage in borrowing in one or other of the 3 per cent. stocks; secondly, definite provision was made in the negotiation of certain loans that the rate of interest should be reduced after a period, say of twenty years, had elapsed.

---

[1] The last lottery took place in 1826 when the whole system was suppressed, cf. Ashton, *op. cit.*, Ch. 20.

[2] In 1755 a profit was obtained from the lottery loan of the year. A loan of £1,000,000 was raised by the issue of 100,000 tickets, while the stock created in payment of prizes amounted to £900,000.

There are two exceptions during these years to the principle of borrowing at par.[2] In 1759, on a loan of £6,600,000, £105 in 3 per cents. was given for a subscription of £100 in cash. Moreover, the same sum entitled the subscriber to a lottery ticket of £10 funded in 3 per cents. Thus a debt of £7,590,000 was created by this operation. Again, in 1760, besides £100 in a 4 per cent. stock, the subscriber of £100 was entitled to a lottery ticket representing an additional capital of 3 per cent. in the same stock. The sum raised was £8,000,000, the debt created £8,240,000.

The country emerged from the war without any regular provision for the repayment of debt. A sinking fund existed, but it had for some time been diverted from the original purpose for which it had been devised. Since 1735 it had been a frequent practice to charge the interest of fresh loans upon the fund, and by an Act of 1752 all new duties were to be carried to it, while it, on the other hand, was charged with the payment of interest on all sums that were raised after that date. The sinking fund had thus come to resemble the fund which was afterwards known as the Consolidated Fund. It had ceased to be regarded as a financial arrangement through which definite provision should be made from year to year for the redemption of debt. It remained chiefly as a device for the co-ordination of the multifarious duties which were specifically raised for the purpose of meeting the charges on public loans.

---

[1] Usually twenty years.

[2] Earlier cases had occurred in 1747 and 1748 when £110 in 4 per cents. was given for £100 in cash.

In addition to the problem of repayment there was also the problem of the floating debt. It was obviously desirable on the termination of the war that this debt, consisting mainly of Navy and Ordnance bills, should be funded on the most favourable terms that could be secured. In 1763, £3,670,739 of Navy and Ordnance debt were funded in 4 per cents., £3,483,553 of stock being created. In 1765, a further £1,367,670 of Navy, Victualling and Transport debt were funded, mainly in 3 per cents., £1,482,000 of 3 per cent. stock being created.

Between 1765 and 1775, £11,443,553 of debt was paid off, but a certain portion of this repayment took place in connection with what would ordinarily be described as conversion operations. In other words, loans were raised in 3 per cents. in order to discharge 4 per cent. debt, *e.g.* the Navy debt funded in 1763. In 1766, 1767, 1768, £4,900,000 was borrowed in 3 per cents. for this purpose. Thus only about five and a half millions can be regarded as having been cancelled during the peace.

The position of the debt at the close of the war naturally created a good deal of alarm. The great increase in the funded debt during the years 1755–65 suggested that another war would bring the country to the verge of bankruptcy. A sinking fund existed in name only and there was a complete absence of any regular provision for repayment. With a continuation of the policy of borrowing no confidence could be felt in the possibility of reaching safety by the adoption of any particular set of measures. A definite abandonment of loans, coupled with a decision to raise the supplies required for war purposes by taxation alone, appeared to be the only way in which security could be obtained.

The outbreak of the war with the American colonies seemed to confirm the most gloomy forebodings which had been expressed. Recourse was again had to borrowing and the debt increased with rapidity. The growth of the debt through loans and funding operations was as follows: [1]

Sums Borrowed	Capital Funded	Interest	Annuities
£	£	£	£
91,763,842	115,267,993	4,142,939	869,625

---

[1] Cf. Hamilton, *op. cit.*, pp. 91–2.

These loans were negotiated partly in 4 per cents., but to a much larger extent in 3 per cent. securities. By the end of the war Consols and Reduced Threes had gained that position which led subsequently to funding taking place almost exclusively in them. Stocks which had been created at 4 or 3½ per cent. for a limited term of years were at the expiration of the period laid down consolidated with the existing block of 3 per cents. Thus £4,500,000 of 3½ per cents. dating from 1758 were united with Consols in 1782. In 1781 the capital of certain 4 per cents. created in 1760 and 1762 was consolidated with the 3 per cent. Reduced.[1]

The table of the growth of the funded debt shows clearly the considerable increase which occurred in the debt beyond the sums received on the loans that were raised. The cause of this increase lay primarily not in the actual issue of stock below par, but in the policy of offering a combination of stocks on the market.[2] Thus in a loan of £13,500,000 negotiated in 1782 for £100 in cash the subscriber received £100 in 3 per cent. Consols and £50 in 4 per cents.[3] The stock created amounted, therefore, to £20,250,000. In a loan of 1781, however, not only did borrowing take place in 3 per cents. and 4 per cents., but the amount of 3 per cent. stock granted for £100 in cash was £150. The loan was for £12,000,000, the amount of stock created was £21,000,000.

During the earlier part of the war the methods employed were similar to those which had been pursued during the Seven Years War. In each loan along with the issue of stock a terminable annuity or a life annuity was granted. Moreover, the policy of introducing the attraction of a lot-

---

[1] The amounts of different stocks created between 1776 and 1784 were as follows:

	£
3 per cents.	64,648,000
4 ,,	32,750,000
5 ,,	17,869,992

Cf. *An Account of the Public Funds*, by W. Fairman (7th Edit., 1824), p. 194.

[2] Although there is a formal difference, the method is of course really equivalent to the issue of two separate stocks below par.

[3] Also a long annuity and participation in a lottery.

tery into the arrangements for the negotiation of a loan, which had been practised during the Seven Years War, was continued for every loan until 1784.

The terms on which borrowing was conducted were undoubtedly expensive. In particular, Lord North was criticized for his handling of the loans of 1779 and 1781. In the loan of 1779, which amounted to £7,000,000, £100 cash had been received for £100 in 3 per cents. and an annuity of £3 15*s.* for twenty-nine years. To this loan a lottery of £480,000 was attached. In the House of Commons it was argued that whereas even a few months previously money could have been borrowed at 3½ per cent. "the loan of the present year is at the rate of between 6 and 7 per cent.": the money could have been raised at 4½ per cent. and the country had been unnecessarily burdened with a permanent charge of £150,000 per annum. North in his budget speech revealed the fact that he had been at the mercy of the loan contractors. He had tried to obtain a fairer bargain, but in vain; and he had closed with the original contractors "because he could do no better." He defended the system of contracting on the ground that "in the midst of a war when great sums were to be borrowed and funded, and a great deal of unfunded debt was floating in the market, he was thoroughly convinced that an open subscription would never answer."[1] But he entirely failed to meet the criticism that he had sold the short annuity at 11½ years' purchase although it was worth four or five years' purchase more. He threw out the suggestion that in future supplies might be raised within the year and borrowing might be avoided. He understood that this method had been practised in Holland, and what Holland did Great Britain surely could also do.[2]

In referring to the terms of the loan of 1780 North openly admitted his dependence on the loan contractors. He declared that he had wished to raise the sum required on a 5 per cent. security but that the monied men had objected. They had also refused to subscribe to a 4½ per cent. stock, and he had finally been compelled to borrow in 4 per cents. He would recommend his successors again to make the attempt to borrow in fives, but he himself had had no alternative. "In fact, the

[1] *Hansard,* Vol. XX, p. 159.

[2] *Ibid., loc. cit.*

sum to be borrowed was a large one; he was the borrower and the monied men the lenders, the result therefore was that the latter prevailed."[1]

The terms of the loan of 1781 were for £100 cash, £150 in 3 per cents. and £25 in 4 per cents., a lottery of £480,000 being attached. North again admitted that he had had to give way to the loan contractors. The contractors would only take the 3 per cent. Consols at 58, though they were standing at 59, and the 4 per cents. at 70, though they were standing at 72. North declared, however, that this was the cheapest form of borrowing. "He should say that it had always been his opinion that the best way of making a loan was by increasing the capital, and to raise the money at as low an interest as possible, because it was the interest that the people were burdened with paying of, and not the capital."[2] He had indeed intended to create a 5 per cent. stock and a terminable annuity, but "when he came to propose it nobody would listen to it, unless he would make the stock irredeemable for fifteen years certain. As to a 5 per cent. stock he scarcely knew at what to have taken it, for some put one price upon it, others another."[3] On the whole he thought that if he had borrowed in a 5 per cent. security, he would have had to pay 7½ per cent. on the money instead of 5½ per cent.

It had been suggested that the Government should seize the sums which persons and bodies in the United States held invested in British Stocks. North repudiated the idea. "Maryland had a sum of money vested in our funds, and we had held it sacred." The obligations of the Government would be observed towards enemies as well as friends.

North thought it possible that the sinking fund might be used during peace for buying up debt at the market price. By savings and retrenchment a million might be secured for this purpose. But he could not suppose that

> "it was by any means advantageous to apply the savings of the sinking fund to this purpose in a time of war, and be under the necessity of borrowing as many new millions as we paid off. This was very

---

[1] *Hansard*, Vol. XXI, p. 158.

[2] *Ibid.*, Vol. XXI, p. 1331.

[3] *Hansard*, *loc. cit.*

disadvantageous to the public, since we should be obliged to pay terms for borrowing one million to pay another. Our debt would not be diminished."[1]

Fox agreed with North's general views on the subject of the sinking fund, but he was afraid that sums might be taken from the existing fund to avoid the necessity of resort to taxation. "The Sinking Fund," he declared, "was the great *dernier ressort* of the kingdom, the last parapet of the constitution and ought to be held in obstinate sanctity." He thought that loans ought to be raised in 5 per cent. stocks, since it would be possible to buy up debt of that denomination more cheaply. But he severely condemned the terms on which the loan of 1781 had been raised. The profit arising from it he estimated at £900,000, and "this large sum was in the hands of the minister to be granted in douceurs to the members of that House."

The charge of corruption[2] ultimately led to the bringing forward of a motion for securing a list of subscribers to the loan, while in the Lords a protest was passed which suggested that the Commons had supported the measure with a view to lining their own pockets. The protest asserted that extravagant terms need never have been granted since "it is allowed that treble the sum subscribed had been offered."[3] The result was that "21 millions are added to the capital of the debt for a loan of twelve; 5½ per cent. perpetual annuity is granted; £650,000 are to be levied in the yearly taxes upon the people."

The firmly established position which the debt had come to acquire is illustrated by North's statement that "it was not in fact true that our debt was more than the annuities which we annually paid." This view, which was subsequently adopted by Chancellors in defence of their abandonment of the policy of debt redemption, was put forward as a justification of the method of funding on a scale considerably in excess of the sums actually raised.

---

[1] *Hansard*, Vol. XXI, p. 1333. This was a reference to the doctrines of Price.

[2] Cf. also Burke's speech. For the question of corruption in the loan transactions of this period compare Erskine May, *Constitutional History of England* (ed. Holland), Vol. I, pp. 257–9.

[3] *Hansard*, Vol. XXI, p. 1386. North himself said "that as to the bargain he felt it to be too good and he was sorry for it."

If the truth of the assertion be assumed there is little doubt that the cheapest forms of borrowing necessitated funding on these lines. It was pointed out at this time that when the three per cents. stood at 59 the fours stood at 72–3.[1] Certain influences, such as the remoter possibility of conversion, combined to give a decided advantage to the 3 per cent. securities.[2] Moreover, the volume of Consols and 3 per cent. Reduced was considerably larger than that of the other stocks, while no 5 per cents. existed until after the close of the war Pitt funded a large quantity of Navy Bills in a 5 per cent. security.

Nevertheless, if the necessity for meeting an increased annual charge had been accepted, a large quantity of 5 per cent. stock might have been placed upon the market. The difficulties in the way of such a policy were clearly shown by North, who had intended apparently to fund on these terms. Yet the advantages to be derived from the creation of a stock of this denomination might be supposed to be considerable. Borrowing would still have been cheaper if carried out in stocks of a lower denomination ; but the nation would have benefited from a restriction on the growth of the funded debt and from the introduction subsequently of conversion operations.

It is difficult, however, to see how a large volume of securities bearing a rate of 5 per cent. could have formed a permanent element in the debt. The very fact of the possibility of conversion shows that on the return of peace the rate of interest would have been reduced and the stocks would have been consolidated with others of a lower denomination. Actually, the consolidation of debt in the 'fifties of the century meant that the bulk of the stocks would for some time consist of Consols and Reduced Threes. Thus the 3 per cents. remained the representative British stocks until Goschen's conversion of debt in 1888–9.

But the real objection to North's attitude lies in his premiss concerning the nature of the debt. Few views could be more inadequate than that which ignores the capital of the debt and considers only the annual charge. It may indeed be desirable

[1] Cf. Fox's speech, *Hansard*, Vol. XXI, p. 1336.

[2] *Vide infra*, p. 113.

at times to emphasize the annual charge and to pay less attention to the funded capital. But it can never be desirable to leave entirely out of consideration the amount with which the debt could be discharged if it had to be repaid at par. The question is not solely one of cancellation of debt, for debt may be redeemed by being bought up, though the price paid for it may be considerably higher than that at which it was issued. But even a minister who is concerned only with the amount of the debt charge must consider the opportunity for conversions, and this opportunity will certainly be postponed if the liability incurred in borrowing far exceeds the sums actually raised.

North himself, however, supported a sinking fund, and the termination of the war found public opinion prepared for the sacrifice involved in any plan which would make regular provision for the repayment of debt. In 1783 the Commissioners of Accounts recommended the creation of a fund to be invariably applied to this purpose. This fund should be " a surplus of the annual income to be obtained by the extension and improvement of the sources of revenue and a frugal administration of its produce." [1] In a later chapter consideration will be paid to the question, how far this alteration in public opinion was due to the propaganda which had been directed since 1770 towards the revival of an effective sinking fund increasing at compound interest? [2] But it is probable that, even apart from this propaganda, the realization of the economic and political effects of the debt was such as to create a demand for a new attack upon the problem. The chief economic evil in the shape of an increased annual burden was too plain to be ignored. The political evil, though perhaps exaggerated, was naturally felt by a generation which had witnessed a development of royal influence. With the increase in the debt was associated the growth of an officialdom which was as much disliked and distrusted as any modern bureaucracy. The way was thus paved for the restoration of those methods of redemption which had for fifty years been practically inoperative.

---

[1] Cf. Postscript to a pamphlet by Dr. Price on *The State of the Public Debt and Finance* (1784).

[2] Cf. Chap. VI.

THE DEBT AND DEBT CHARGE OF GREAT BRITAIN, 1757–84

	Funded Debt £	Unfunded Debt £	Debt Charge £
1757 . . .	76,751,255	1,065,927	2,735,925
1763 . . .	128,564,808	3,555,856	5,008,918
1765 . . .	128,305,032	2,966,526	4,906,465
1776 . . .	125,113,255	5,337,751	4,814,714
1781 . . .	176,113,255	11,643,026	7,343,941
1784 . . .	227,240,597	13,685,311	9,406,406

CHAPTER V

EIGHTEENTH-CENTURY VIEWS ON THE DEBT

There are perhaps serious objections to any attempt to embrace in one survey a variety of views expressed upon a subject-matter which is continually changing. Between 1740 and 1790 considerable changes took place both in the amount and in the character of the public debt, and it may therefore appear improper to compare even over such a short period the opinions which were put forward upon the subject. There may be some doubts as to the possibility of drawing any valuable conclusion from a comparison, for example, of *An Essay upon the National Debt and the National Capital*, published in 1750, and Sir John Sinclair's *History of the Public Revenue of the British Empire*, the first edition of which appeared in 1789. Between these two periods the debt had been swollen by the costs of the Seven Years War and the War of Independence. Such a growth might be supposed to have brought about a very considerable change both in the quantity and in the quality of the problems that presented themselves.

But the difference is not as great as at first sight it appears to be. Not only was there an increase in the size of the debt, there was also an increase, though not proportional, in the means [1] which the country possessed for bearing the additional burden. One is not forced to make a comparison between a country lightly burdened with debt and a country heavily burdened. Moreover, an examination of the writings of the period shows that, in fact, similar problems were being considered, and that the views are capable of being compared with one another. For example, the problem of foreign holdings of British funds was discussed throughout this period, and opinions were expressed upon both the economic and the political consequences of a situation in which large sums had to be sent abroad in payment of interest.

---

[1] Including growth of numbers as well as of wealth per head.

On the other hand, misapprehension is likely to arise if the writings are taken together indiscriminately and no distinction in time is drawn. The pessimistic views of Adam Smith and Hume are not fully appreciated if they are grouped with the opinions of writers who had before them the financial results of the War with America. The idea of raising the supplies within the year meant one thing for Sir Matthew Decker and another thing for those who had to meet the immense cost of the Napoleonic Wars.

It is tempting to classify the writers as optimists and pessimists, but no serious writer took what can fairly be described as an optimistic view of the public debt. There were, of course, persons such as Adam Smith describes, who regarded the debt as an element in the wealth of a nation. In Berkeley's queries we find the questions:

> "Whether the credit of the public funds be not a mine of gold to England? And whether any step that should lessen this credit ought not to be dreaded? Whether such credit be not the principal advantage that England hath over France, I may add, over every country in Europe? Whether by this the public is not become possessed of the wealth of foreigners as well as natives; and whether England be not in some sort the treasury of Christendom?"[1]

The fallacy appeared perhaps more clearly in the statement that "the National Debt is as much a real possession as any property in silver or gold."[2] But on the whole even persons who adopted the more favourable view of the subject were only prepared to claim that the payment of the debt was simply a transfer, and did not maintain that it produced a clear advantage to the country.[3]

Hume probably took the most gloomy view of any writer of the earlier half of this period. In his *Essay on Public*

---

[1] *Queries* 233, 234, 235.

[2] Hope's *Letters on Credit*, p. 19.

[3] Malachy Postlethwayt (*Dictionary of Trade*, Article *Funds*) says that the author of *An Essay on Public Credit* (1748) argued that "if 60 millions of our debt be the property of the people of Great Britain we are not the richer nor the poorer for that part of the debt," and that "if it were possible honestly to discharge the whole national debt . . . such losses and inconveniences would arise . . . as would greatly diminish the trade of our country."

Credit[1] he examined public debts from two standpoints: (*a*) their influence on commerce and industry, (*b*) their influence on foreign transactions, by their effect on wars and negotiations. Under the first heading he found it possible that a certain advantage might accrue. Public securities provided a safe and easy form of investment; merchants who had idle balances on hand would buy funds and avoid the loss on keeping the money in safe or till.[2] Thus the public debt might even contribute indirectly to the lowering of the rate of mercantile profit.[3] But against this solitary advantage many disadvantages were to be set. The debt had caused a great flow of wealth and of people to the capital. The Stocks exhibited all the evils which were associated with the issue of paper money. The taxes which were required to pay the interest raised the price of labour or were a burden to the poor. The existence of the debt gave encouragement to the living of useless and idle lives.

So far as the second consideration went "the ill is here pure and unmixed." The public debt tended to place the country in a condition of poverty, impotence and subjection to foreign powers.

Hume's chief emphasis lay on the political consequences of the debt. He disposed, it is true, of the economic fallacies that the debt was a source of wealth and that the question was simply one of the right hand paying the left. But he was mainly concerned with the difficulties which must arise from the political power which the stockholders would acquire. When the various sources of wealth had been mortgaged to them they would be supreme in the State. Finally, therefore, either the nation must destroy public credit or public credit would destroy the nation. There were three ways in which public credit might be extinguished: it might "die of the doctor"; it might suffer a natural death through a series of public calamities; or it might meet a violent death, such as repudiation. Hume was sufficiently bold to prophesy that the second of these alternatives would probably occur in half a century.

---

[1] Essay No. VIII in *Essays Moral, Political and Literary*, Part II (1752).

[2] "Public securities are with us become a kind of money and pass as readily at the current price as gold or silver." *Essays*, p. 198.

[3] Compare Adam Smith's statement, *Wealth of Nations* (ed. Cannan), Vol. II, p. 404: "In England, the seat of government being in the greatest mercantile city in the world, the merchants are generally the people who advance money to government."

Adam Smith took a line which was hardly less pessimistic than that of Hume. Great Britain had borne a burden which no one living half a century earlier would have thought her able to bear; but "let us not rashly conclude that she is capable of supporting any burden."[1] Bankruptcy, either open or avowed, was the inevitable outcome of any great accumulation of debt, and the great nations of Europe were oppressed by debts which would in the long run overwhelm them. Arguing from British experience Smith displayed a good deal of scepticism about the advantages to be derived from sinking funds. They were generally inadequate, and events proved that on the slightest provocation they would be raided. Smith's only solution of the problem lay in a recognition that the Empire might be called upon to make some financial contribution. He held it to be "not contrary to justice that both Ireland and America should contribute towards the discharge of the public debt of Great Britain."[2] By referring to the effects of taxation he showed clearly where the burden of the debt lay and disposed of the view that the payments involved could be regarded simply as a transference of wealth.

Blackstone in his *Commentaries* used arguments similar to those which had been put forward by Hume, but laid greater emphasis on the economic evils of the debt.[3] A certain amount of debt might, he thought, "be highly useful to a trading people." But there were four considerable disadvantages which were involved in a large public debt such as that with which Great Britain was burdened. The taxes which were required raised prices and were injurious to trade and manufactures. So far as any portion of the debt was owing to foreigners they either took out specie from the country in payment or obtained in the terms of the loan unreasonable privileges. So far as the internal debt was concerned, the industrious member of the community had to maintain the idle creditor. Finally, the strength of the State was weakened by the policy of anticipating its resources.

---

[1] *Wealth of Nations* (Cannan's edition), Vol. II, p. 415.

[2] p. 429.

[3] *Commentaries*, Bk. I, c. 8 (see McCulloch's *Collection of Tracts on the National Debt*, pp. 293–311).

Of those who took a more favourable view of the situation some urged that under given circumstances certain benefits might be derived from the existence of a public debt: others produced schemes whereby they hoped to show that without much additional sacrifice the whole or at least the greater part of the debt could be extinguished.

Wallace[1] held that "public debt can never be profitable in its own nature, though it may sometimes be both necessary and attended with accidental advantages." He also believed that public debts did not produce such disadvantages among "rich commercial nations" as in "nations where the agriculture bears a greater proportion to the trade and manufactures."[2] He recognized the point made by Hume that public securities provided a channel of investment for balances which would otherwise lie idle. But he found it not easy to set any limit to the extent of public borrowing: in the case of "a rich commercial nation as Britain" the limits "are larger than many have imagined." He appears to have been the only writer of the period who recognized the advantages which might be derived from a productive debt. In this respect public borrowing and private borrowing were comparable.

> "If the Government has some grand or useful scheme in view, either to drain marshes, to render rivers navigable, to encourage some branch of industry or to maintain their liberty or trade against a powerful and ambitious enemy, and cannot raise the necessary sums by taxes in due time: it may be prudent to borrow the money and to establish a proper method of repaying it at leisure."[3]

The resources of the country might be so developed by such a policy that a moderate tax on the additional wealth created might be sufficient to pay both interest and principal of the loan. Wallace was critical of the view that the existence of the debt caused men to "give up trade and live on interest." "*Landed* men," he declared, "ought to be cautious of proposing to abolish the public debts by a law, or taking away the estates of the stockjobbers *as idle and useless members of the State*. If ever all *rich, idle, useless* members of the society should be punished, stockjobbers would not be the *only sufferers*."[1] Repayment of the debt was certainly desirable, but there was no reason "to apprehend that the nation either is impoverished by these debts in the meantime, or is unable to extinguish them without distress whenever they set heartily about it." Even if the country had a debt of £80,000,000 that sum probably did not exceed and perhaps did not even equal the "yearly revenues of the people of Great Britain and Ireland."[2] Wallace's solution of the problem, however, appears hardly adequate to the difficulties of the situation. "It would be sufficient if the richer sort would voluntarily entrust the Government with their plate and submit to the small inconveniency of wanting the use of it for a season."[3]

---

[1] *Characteristics of the Present Political State of Great Britain* (1758), Part II of National Debts, p. 51.

[2] *op. cit.*, p. 57.

[3] pp. 57–8. A modern writer on public finance would be disposed to make a rather finer discrimination between the different objects of public expenditure.

Andrew Hooke, writing in 1750,[4] hoped to show by the production of elaborate statistics that the debt was "but a diminutive part" of the capital of the nation, and brought forward a scheme which, he claimed, would discharge the whole liability of the nation in a hundred years. Taking the debt to be £80,000,000 he estimated the capital of the nation (in 1750 and 1688[5]) as follows:[6]

	1688 £	1750 £
Cash ($\frac{1}{20}$ of Personal Stock) .	18,500,000	30,000,000
Personal Stock . . .	370,000,000	600,000,000
Land	228,166,666	370,000,000
	£616,666,666	£1,000,000,000

The income of 1750 might be estimated at one-tenth of the capital, *i.e.* £100,000,000 and the population at 10,000,000 with an annual expense of £88,500,000 giving "an annual increment of stock" of £11,500,000.

---

[1] p. 61. [2] *Ibid.*, pp. 184–5. [3] *Ibid.*, p. 187.

[4] *An Essay on the National Debt and National Capital.*

[5] This estimate, as Hooke points out, differs very considerably from Davenant's.

[6] *Essay*, pp. 14–15.

The proportions, therefore, were as follows:

National Debt to National Capital	1 to 12
National Debt to National Income	4 to 5
National Debt to Increment of Stock	7 to 1

The interest of the debt did not amount to even one-thirtieth of the National Income. Hence:

> "it is clear that the paying off the National Debt is not a Matter of that Importance to the Community as is generally imagined; so that it may subsist many Years longer without Prejudice to the Constitution; and even be increased to double the Sum without any real Danger of *National Bankruptcy*."[1]

Hooke's scheme for paying off the debt consisted simply in a conversion of the perpetual annuities into long-period terminable annuities.[2] The £80,000,000 of debt was to be divided into eighty parts of £1,000,000 each: the interest on each million was to be converted into an annuity of £35,000 to be granted for ninety-nine years to any subscribers who advanced the million towards the discharge of the debt. Hooke reckoned that a clear annuity for ninety-nine years with Government security was worth at least thirty years' purchase, and that the subscribers would therefore make a profit of £50,000. But he believed that few people understood the real value of annuities and was prepared to introduce some additional attraction, in the shape of a lottery, into his plan.

Hooke's work appears to represent an attempt to meet the views and prophecies expressed by Hume. To Hume's fear of bankruptcy he replied with a parade of statistics intended to show that the debt bore but a small proportion to the capital of the nation. On the other hand, it is highly improbable that his proposals for a conversion of the debt into terminable annuities would have met with any success, and his optimism might have been qualified had he witnessed the subsequent development of the funding system.

The mercantilist views of Sir James Steuart[3] probably provide a better contrast with Adam Smith's chapter on Public Debts. In spite of a clash between his financial and monetary theories Steuart appears on the whole to have regarded public debts in a favourable light. Stock he held to be "one great branch of solid property, so far as the security of Government is solid and good"[1]; but this property was "formed out of the income of the whole nation." Consequently "the more the debts increase by the monied interest realizing into this branch of solid property, the more the taxes must augment."[2] But, on the other hand, turning to the monetary aspect of the question he decided that

---

[1] *Essay*, p. 44.

[2] *Ibid.*, pp. 46–54.

[3] *An Inquiry into the Principles of Political Œconomy* (1767), Book IV, Part IV, of Public Credit.

> "the effect of public borrowing, or national debt, is to augment the permanent income of the country out of stagnant money and balances of trade. . . . If stagnations in one part are found to interrupt circulation in another public borrowing for domestic purposes has the good effect of giving vent to stagnation and throwing money into a new channel of circulation."[3]

Politically he found that in Great Britain the whole nation was determined to maintain public credit, and that the commercial interest entirely depended upon it. The only danger was that the public creditors would ultimately gain supreme power in the State. He dealt with the support which the public debt offered to a monied interest and the dangers which the State might have to fear from such an interest. While recognizing, however, that in England the views of the monied interest were generally adopted he believed that its conversion into a landed interest was "more and more the case every day."

Some of Steuart's most interesting work on this subject lay in a comparison of the financial conditions of France and England. He believed that in Great Britain attention was chiefly devoted to the rate of interest paid on the debt, while in France emphasis was placed upon speedy repayment of the principal.[4] The credit of Great Britain was so firmly established that a British Government could borrow at all times;

---

[1] *op. cit.*, Vol. II, p. 447.

[2] *Ibid.*

[3] pp. 451–2. Fears that the repayment of debt would cause "a stagnation in the circulation" are mentioned by Postlethwayt (*Dictionary*, Article *Funds*).

[4] p. 439.

but in France arbitrary reductions of interest by royal fiat had made credit much more precarious. Thus "in Britain credit is young; and has been tenderly reared. In France she is old, and has been accustomed for many ages to rougher usage." [1] Accordingly, after the collapse of credit in France towards the end of 1759 Great Britain had had the command of all the loanable money in Europe.

Steuart discussed the possibility of a bankruptcy. Although he thought that a contradiction was implied in the view that a nation must become bankrupt to itself, he held the idea of a nation becoming bankrupt to the rest of the world quite "consistent with reason and common sense." Such a situation would arise if "the sum of interest paid to strangers should exceed all that the nation can gain by her trade." In any case the limits to which taxation might be carried could not be definitely determined, and hence it was impossible to state how far public indebtedness might be increased without a financial revolution.[2] Steuart's final conclusion on the subject was that

> "Public debts do not so much affect the prosperity of the State as private debts do that of the debtor. The interest of a private debtor is simple and uncompounded; that of a state is so complex, that the debts they owe, *when due to citizens*, are on the whole rather advantageous than burdensome: they produce a new branch of circulation among individuals, but take nothing away from the general patrimony." [3]

The great growth of public indebtedness had also produced a current of thought which was directed towards a series of practical proposals whose purpose was associated rather with the avoidance of any fresh borrowing than with the repayment of debt already incurred. The policy of "raising the supplies within the year" was urged by Sir Matthew Decker, Malachy Postlethwayt, Arthur Young and William Pulteney. Decker, in his *Serious Considerations of the Several High Duties which the Nation in general labours under* (1743), estimated the expenditure of the State at £5,000,000 and proposed to levy a duty of £10 on each house in the country, which would yield the required sum and a surplus of £1,000,000. More important perhaps was his suggestion that if in the future additional sums were needed, they might be obtained by adding for every million one-sixth on to the duty on each house. Malachy Postlethwayt in *Great Britain's True System* (1757) argued that the probable ruin within a short time of " the monied, the trading and the landed interests " showed the necessity of raising within the year by taxation the sums required for carrying on war. He held that " Since our Debts have taken Place not near one-tenth of the Land of *England* is possessed by the Posterity or Heirs of those who possessed it at the Revolution " ; [1] and he compared the position of stockholders and jobbers with that of the clergy at the time of the Reformation. He referred to Decker's proposal, but preferred himself a personal tax, which would work out on the average at £3 per head per annum.[2] Arthur Young, writing at the time of the war with America,[3] asserted that " every mortal must be convinced that the end of our national credit is fast approaching—perhaps happily for us." [4] Young calculated the income of Great Britain at £110,000,000 per annum and its taxation at £13,000,000 per annum. He thought that few people would deny that the national income could stand a permanent charge of £13,000,000 and meet in addition a temporary charge of £8,000,000. Additional taxation to this amount should be levied within the year in order to avoid the necessity of fresh borrowing.

---

[1] p. 379.

[2] *i.e.* either national bankruptcy or a mortgaging of the property of the country to the public creditor.

[3] p. 625.

At the same time William Pulteney, in a pamphlet entitled *Considerations on the Present State of Publick Affairs*, proposed to raise the sums required by a tax on capital. He estimated the property of the community at £1,000,000,000 and argued that by a duty of 1½ per cent. on this amount, to be paid by instalments, £15,000,000 might be raised in two years. Pulteney believed that outside England " no state in Europe, Holland excepted, could raise supplies for a war, in the manner proposed." [5] Political freedom was indispensable to the carrying out of such a policy, since only a free people could be induced to make the sacrifices which would be required.

---

[1] *op. cit.*, p. 17.

[2] The maximum would be £20, the minimum £2.

[3] *Political Arithmetic* (1779), Part II.

[4] p. 2.

[5] *Considerations*, p. 32.

The great growth of the debt during the War of Independence might be supposed to have only intensified the fears of a national bankruptcy which had already been expressed. But in Sir John Sinclair's history of the revenue [1] a statement of the evils resulting from public debts is combined with a broad recognition of the funding system as a workable arrangement. Sinclair recognized that the taxation required to pay the interest on the debt involved a heavy burden on the nation; he also believed that foreigners held about one-ninth of the British debt and that a tribute of £1,000,000 per annum had to be paid to them. But he was primarily concerned with the moral and political evils. Public debts promoted idleness and immorality and introduced "a pernicious spirit of gambling." Politically they led to the creation of officials, to the establishment in power of a monied interest, and ultimately to a weakening of the nation through their incessant growth.

On the other hand, definite advantages were to be placed to the credit of the funding system. The political benefits to be derived from a system of borrowing, provided that its limits were duly observed, certainly outweighed the corresponding disadvantages. "When money can be raised without difficulty the greatest exertions may be made with the highest probability of success." Thus, "By the magic of public credit, fleets are equipped, and armies are levied, with an expedition almost incredible." [2] Against the economic disadvantages of the system could be set the facts that public debts probably retained at home money which would otherwise be exported and that they were "particularly favourable to the circulation"; while even Hume had recognized the use of public securities as forms of investment. Sinclair was opposed to the policy of raising supplies within the year: if such a policy were carried out expenditure would be curtailed, and "the employment of the poor and the consumption of the rich would be considerably diminished." [3]

Sinclair clearly did not share the fears of his predecessors. He was inclined to suppose that "our present distresses are in a great measure owing to our want of experience in regard to the funding system."[1] Since the system had to be regarded as a necessary element in the financial organization of Great Britain, care should be devoted to placing it upon a sound workable basis. The State should never bind itself to repay a penny more than it borrowed. Financial policy should make possible the introduction of conversion operations after five or seven years. Funding should take place only in perpetual annuities. On the subject of a sinking fund, however, there might be some dispute. Sinclair thought it possible that a surplus might be better "expended in the encouragement of industry; in promoting the cultivation of the soil and in extending commerce and navigation,"[2] than in the redemption of debt. He found it difficult to answer the question, "If the sum that has been applied to the discharge of our funded incumbrances, had been expended solely in making Great Britain one populous and cultivated field or garden; whether the nation could not have borne the whole debt with less difficulty than it now can support the debt as it has been reduced?"[3] On the whole, however, he was in favour of the institution of a sinking fund. "The load of debt ought to be considered as a means of amassing treasure," since "were one to two hundred millions of our present debts fairly discharged we should have a treasure to that amount for ever at our command." Such a sinking fund should be established upon "some great solid and productive tax," and should be allowed to accumulate in the hands of a special commission to whom it would be entrusted. Sinclair believed that an inalienable sinking fund would pay off in sixty years, at the rate of 75 per cent., a debt of nearly £317,000,000 in 3 per cents. He met the "plausible" objection that "it would be absurd to employ money in the paying of old debts if a nation is at the same time under the necessity of contracting new incumbrances." He thought the difficulty could be solved in the following manner: "Let the public, in times of emergency, borrow from that fund what money it can spare; *but let it at the same time provide a fund for defraying the interest of the money that it borrows*, giving the sinking fund a proportional share of the new loan."[4] He brushed aside

---

[1] *History of the Public Revenue of the British Empire*, 1st Edit. (1785–9).

[2] *op. cit.*, Part II, p. 19.

[3] *op. cit.*, Part II, p. 20.

[1] p. 130. [2] p. 124. [3] p. 126. [4] p. 127.

the objection that a genuine sinking fund necessitated the levying of taxation and that taxes were taken out of "the national stock of industry and taxable capacity," where it was equally true that money ripened at compound interest. Taxes, Sinclair thought, could be borne by the nation and did not only affect the "industrious part of the community. When wisely imposed they in general fall upon the idle consumer." Nevertheless, it was highly undesirable to repay the 3 per cent. debt of the nation at par or even to buy it up openly in the market. Probably the State should come to some arrangement with the creditors whereby they might be repaid at 75 per cent. But if an arrangement of this sort were not established—and Sinclair was particularly critical of Pitt's sinking fund on this ground [1]—it would be better to abolish unpopular or burdensome taxes or to lay the money out on improvements.[2]

In the discussions of this period as much attention was devoted to political as to economic problems. So far as political problems were concerned, consideration was chiefly paid either to the influence of the Public Debt upon the balance of power within the State or to the dangers to be anticipated from large foreign holdings in British Funds. Internally, the growth of the debt suggested the possibility that power might in fact be concentrated in the hands of the public creditors. The creditors could be represented as a small minority—Hume refers to a calculation that all the creditors, British and foreign, only amounted to 17,000—tyrannizing over the mass of the people. With every fresh emergency additional taxes would have to be levied until finally the whole property of the country would be practically mortgaged to this creditor class. Other writers devoted their attacks more particularly to the "monied interest" or to the stockjobbers. Sir James Steuart held that "in governments where the swelling of a monied interest is found to threaten the tranquillity of the State care should be taken either to establish a Sinking Fund . . . or the plan of borrowing upon determinate [3] annuities must be established."

---

[1] *op. cit.*, Part III, p. 282.

[2] For Sinclair's proposals, *vide History of the Public Revenue*, Part III, pp. 272–9.

[3] *i.e.* terminable.

Other political dangers were also considered. The development of perpetual annuities and the corresponding growth of a system of permanent taxes had led to something very like a perpetual hereditary revenue. The sinking fund, diverted from its original purpose, had become a conglomeration of such permanent taxes. "A standing-perpetuated-Revenue," Postlethwayt declared, "is not less dangerous to the Liberties of the Parliament and of the People, than a standing-perpetuated-Army."[1] The peculiar position of the sinking fund in the financial system actually made reductions of interest undesirable, since they would only add to this permanent revenue of the Crown. Nor was this the only way in which the debt could increase the royal power; the employment of an army of officials in the administration of the financial system and of the revenue would extend the scope of patronage.

A good deal of alarm was felt about the amount of foreign holdings of British Government securities.[2] Undoubtedly they formed a popular investment for the reasons which were clearly explained by Steuart. The British Government had never defaulted and had never reduced the rate of interest by arbitrary acts of power. Between 1715 and 1770, on the other hand, France had witnessed five attacks on the public creditor;[3] in some cases the capital had been reduced, in others the rate of interest had been cut down. In periods of disturbance on the Continent funds seeking investment naturally came over to England, while on the restoration of peace they were liable to be withdrawn.

Dutch holdings of British securities were probably large. It has been said that during the War of Independence the people of Amsterdam seriously considered the question how long England would be able to go on paying the interest on its debt.[4] But it is difficult to determine the measure of support which British credit owed to Dutch capital during the eighteenth century. The author of *The Present State of the Nation* believed that the interest due to foreigners amounted to £1,560,000. Sir John Sinclair[5] calculated it at £1,000,000.

[1] *op. cit.*, p. 122.

[2] Compare M. Postlethwayt, *Dictionary of Trade*, Article *Funds*.

[3] Cf. Stourm, *Finances de l'ancien régime*.

[4] Cohn, *System der Finanzwissenschaft*, p. 680.

[5] *Vide supra*, p. 83.

Sinclair produced an estimate[1] of the quantity of foreign property in British funds in 1762. He calculated that the capital amounted to £17,000,000, the interest to £720,000.[2] The holdings were distributed as follows:

	Number of Proprietors	Capital			Interest		
		£	*s.*	*d.*	£	*s.*	*d.*
1. Perpetual Annuities .	6,330	14,956,395	18	0[3]	562,338	4	6
2. Temporary Annuities	190	—			14,275	4	4
3. South Sea Stocks and Annuities . .	—	? £1,000,000			—		
4. East India Stock .	—	? £1,000,000			—		

Sinclair held that by 1789 foreign holdings in perpetual and temporary annuities had on the whole been doubled. The only exception was Bank Stock, where the amount held by foreigners had declined from £4,627,858 in 1762 to £2,833,276 in 1782. He put the total amount of foreign property in the Funds in 1789 at £25,000,000, of which £20,657,075 might be taken to be in the 3 per cents. and 4 per cents.[4]

The amount of foreign property in British Government Stocks in 1806, as calculated by the exemptions claimed in respect of duty on dividends under the Property Tax Act, was £18,598,606 (excluding terminable annuities and Bank Stock).[5] This amount fell to £14,566,994 in 1810, rose to £17,334,458 at the close of the war in 1816 and afterwards declined considerably, reaching £12,729,618 in 1818. Throughout the period the largest proportions of the holdings were in Consols and Reduced Threes.

Apart from the difficulty of verifying these estimates it is clear that the figures for a particular year do not provide a basis from which conclusions may be drawn. In the Napoleonic Wars, however, the estimates become more reliable; they suggest that while foreigners were investing in British securities, the country was tending to rely more fully upon her own supply of savings, and that at the close of those wars a fairly large proportion of foreign capital was withdrawn for investment in Europe.

---

[1] From a manuscript in his possession. Cf. *History of the Public Revenue*, Part III, Appendix.

[2] Compare, however, *An Account of the Public Funds transferable at the Bank of England*, by W. Fairman (1824). Fairman took holdings in South Sea Stock and Annuities at £2,500,000, in East India Stock at £500,000, thus reaching a total of £18,000,000.

[3] Including £4,627,858 5*s.* 2*d.* in Bank Stock.

[4] In the 3rd edition (1805) he puts the total at £30,000,000.

[5] Fairman, *op. cit.*, p. 230.

That Great Britain should be dependent in this way upon foreign support naturally appeared to be politically disadvantageous. But the economic evil was also apparent. Sinclair asserted that "if we were obliged to pay a tribute of that amount (*i.e.* £1,000,000) to France, or to any other foreign state, every person would declare that the nation must infallibly be undone; yet, the tribute paid to foreign creditors, is at present on a footing infinitely more pernicious." [1] This view was frequently reinforced by mercantilist fears as to the effect that the payment of the "tribute" would have upon the "balance" with other nations and upon the export of specie.

Although opinions differed about the economic effects of public borrowing there appears to have been general agreement on two points. First, the advantages of the debt from the standpoint of investment were fairly widely recognized; the existence of a large block of marketable Government securities rendered the keeping of considerable cash balances no longer necessary. Persons with sums at their disposal found available a safe and realizable form of investment. These advantages naturally became less apparent as other similar types of investment developed, but for a long time they endured. More particularly, prior to the growth of a sound system of banking, the Funds must have provided facilities which could hardly have been discovered elsewhere.

Secondly, there appears to have been little disposition to deny the evils associated with the necessity of raising taxation in order to pay the interest on the debt. Adam Smith probably put this point more clearly than any other writer in his exposition of the "sophism of the mercantile system" that the payment of the debt was simply a transference. The general economic effects produced by the existence of the debt were, however, to some extent confused with its moral influence. The debt was regarded at the same time as a source of indolence and profligacy and as a cause inducing people to withdraw from trade and enterprise. A good deal was also heard of what in modern controversy would be described as the conflict between the *rentiers* and the business community. The chief difference, apart from modern monetary problems, lies in the fact that in eighteenth-century discussion the comparison would rather be drawn between the claims of the "landed interest" and of the *rentiers*. It was, however, more usual to contrast the idle stockholder with the active and industrious classes in general.

---

[1] *op. cit.*, Part II, p. 28.

Fears as to the consequences of the growth of the system of public borrowing produced little in the way of proposals for debt redemption. A few writers appear to have been content to rely upon some form of sinking fund. But the experience of sinking funds, as Adam Smith pointed out, offered little hope of any serious reduction of debt from this source. Probably all that was considered practicable in the circumstances of the time was the institution of some policy whereby a check might be imposed on further borrowing. Hence arose proposals for raising supplies within the year. With the growth in the magnitude and cost of war, however, this proposal could hardly be maintained in its entirety; in its place there ultimately arose considerations of the proportions of war costs which should be met by taxes and loans respectively.

Modern discussion of the problems of war finance deals partly with the question of the amount of taxation that can be raised during a war, partly with the controversy as to the proportions in which the costs of a war should be borne by the existing generation and by posterity. Eighteenth-century writers were more closely concerned with the problems of taxable capacity. But the proposals for raising the supplies within the year show that the question was not mainly that of the amount of taxation that could be borne during a war. The real difficulty of the situation was thought to lie in the increased taxation which a policy of continuous borrowing would ultimately involve. The limits of taxable capacity were thus considered rather as a problem which would arise in the future if funding continued than as an immediate difficulty to be solved. From this attitude there developed the discussion of a national bankruptcy. It was widely felt that if no check were imposed on the financial methods which were being pursued the debt charge would reach a point at which it could no longer be borne.

Probably the fears of a bankruptcy were exaggerated. Nor is it easy to see why such emphasis should have been placed on the debt charge. If this charge is compared with aggregate expenditure in periods of peace the proportion seems to be fairly constant. Thus the proportion of debt charge to aggregate expenditure was approximately 45 per cent. in 1750, 42 per cent. in 1765 and 45 per cent. in 1775.[1] Possibly the magnitude of funding operations created a greater impression than did the growth of expenditure.

As fresh difficulties were surmounted, however, a more cautious attitude was displayed, and greater hesitation was expressed in the attempts that were made to define the limits of the taxable capacity of the country. Thus Great Britain emerged from each war in which she became engaged with a vastly increased load of taxation until it had almost come to appear that, in spite of Adam Smith's dictum, she was capable of bearing any burden.

---

[1] After the War of Independence the proportion was somewhat higher, *viz.* 56 per cent. in 1786.

CHAPTER VI

THE REVIVAL OF THE SINKING FUND

In the latter half of the eighteenth century no work on the subject of the debt probably attracted as much attention as that of a certain Nonconformist minister, Dr. Richard Price. Price's influence can be ascribed to the fact that he did not stop at the point at which Hume and Smith stopped ; he certainly prophesied disastrous consequences to the nation if no measures were taken to deal with the debt, but he went further and pointed out a way by which the problem could reach a solution. Nor did his solution belong to that class of schemes which by their suggestion of the necessity of an heroic effort, or of an unparalleled sacrifice, encountered opposition from the very persons whose co-operation would be required to put them into effect. He appeared to say that the whole question was one of elementary arithmetic—that the operation of the principle of compound interest was by itself sufficiently powerful to wipe out, say, £100 millions of debt with the help of a sinking fund of £1,000,000 per annum in the short space of forty years.

Obviously Price's thesis was not really novel, and he admitted the fact. The principle which he extolled was at the root of Walpole's Sinking Fund ; it had been maintained by Gould in 1726 that " a sinking fund increasing at compound interest would be sufficient not only to discharge our present Debt, but any probable Addition in the mean time to be made to them by further Loans in a few Years after the present Debts shall be discharged " ; and finally it was supported by Postlethwayt in his *Dictionary*. Such novelty as there was lay rather in the application and working out of the scheme than in the principle to be applied.

In Price's *Treatise on Reversionary Payments* (1771) the main outlines of his plan had already taken shape and the more startling of his paradoxes had appeared. Of the evils of the debt there could be no doubt. By creating jobs and places it rendered the Crown increasingly powerful; it perpetuated the "execrable practices of the Alley"; it involved the payment of a tribute to such foreigners as had become creditors; it raised the price of provisions and of labour; it thus checked population and burdened our trade and manufactures.

There were various methods by which the principal of the debt might be reduced. Price recognized the possibility of achieving certain results by a scheme of terminable annuities, but he quite definitely held that such a scheme could not stand comparison with a sinking fund operating at compound interest. The smallest fund of this kind was, he argued, omnipotent if it were allowed time to operate. If it were possible to devise a plan which would effectively prevent the sort of raiding of the fund which had taken place in the past, the redemption of the debt could be regarded as mathematically certain.

Price's advocacy of the cumulative sinking fund was thus far expressed in a manner to which probably no exception would be taken. But he was not content with a simple statement of the principle. In fact, he proceeded to deduce from it a series of conclusions which must even at the time at which they were stated have been regarded as paradoxical. He contended that the nation should attach no importance to borrowing at a low rate of interest, since the higher the rate the more rapidly would the cumulative sinking fund operate upon the debt. Conversions of debt from a higher to a lower rate of interest were not merely futile, they were often definitely harmful. The savings secured would probably be applied not to the redemption of debt but to meeting deficits caused by bad management. Thus the crisis would only be deferred to a period at which its consequences would be still more disastrous. Nor did Price stop at this point. In an argument which was subsequently to be treated with the most extraordinary respect and fidelity, he maintained that "War would accelerate the redemption of the public debts; and it would do this the more, the longer it lasted and the higher it raised the interest of money."[1] Sophistry alone was responsible for the view that it was a matter of indifference whether the sinking fund should be alienated or a loan should be raised to meet fresh expenditure. The difference between the two policies was "no less than infinite."

---

[1] *Reversionary Payments*, p. 158.

In his *Appeal to the Public on the Subject of the National Debt* (1772) the whole theme was restated and elaborated. The true principles of the sinking fund were illustrated by the three ways in which it might be applied. In the first place, the interest of the debt redeemed might be employed in purchasing and redeeming other public debts; in the second place, the interest might be spent on current services; in the third place, the taxation hitherto required to meet the interest might be repealed. The difference between the three policies could be easily expressed: "A fund of the *first* sort is money bearing compound interest—A fund of the *second* sort is money bearing simple interest—A fund of the *third* sort is money bearing no interest."[1]

There could be no doubt as to the form of sinking fund which would be most adequate to its purpose. Price was confident that a simple illustration of the difference between a sum increasing at compound interest and a sum increasing at simple interest would convince even the most sceptical member of the public.

> "ONE PENNY, put out at our Saviour's birth to 5 *per cent. compound* interest, would, before this time, have increased to a greater sum than would be contained in A HUNDRED AND FIFTY MILLIONS OF EARTHS, all solid gold. But if put out to *simple* interest, it would, in the same time, have amounted to no more than *seven shillings and four pence half-penny*."[2]

The paradoxes of the former exposition were repeated and fresh paradoxes were introduced. Thus Price argued that a state might without difficulty redeem all its debts by borrowing for the purpose at an equal or even at a higher rate of interest than that borne by the debts to be redeemed. It is worth noticing, however, that he recognized the desirability under certain circumstances of an alienation of the sinking fund.[3] Deviation from the path of financial rectitude was justifiable if borrowing would imply the diversion, for the purpose of paying interest on the new loan, of sums which would have gone to the fund, or if a new tax or saving would be created to replace the sum diverted from the fund. Again, the sinking fund might be deprived of its tribute of interest on redeemed debt if it had operated its "full time," or if the limit of taxable capacity had been reached. But none of these qualifications, with the possible exception of the last, was now applicable and there was therefore no excuse for a weak treatment of the debt problem.

---

[1] *Appeal*, p. 4.

[2] *Ibid.*, p. 19.

[3] *Appeal* (2nd Edit.), pp. 65–7.

At the outset the fund would presumably be fed by new taxes or assisted by economies in expenditure. A tax on bachelors appeared to Price a useful instrument for securing at the same time a redemption of the debt and a relief from the depopulation which he imagined to be taking place. A contribution might also be expected from the profits of a lottery.

In a third edition of his *Reversionary Payments* (1773) Price alluded to a proposal before Parliament[1] to apply a surplus of £1,200,000 and a profit of £150,000 from a lottery to the formation of a cumulative sinking fund on the lines which he had laid down. But he was sceptical about the existence of such a surplus, and even if it were to arise he thought it would probably be misapplied. What was wanted was a permanent fund, entrusted " to a particular commission, acting under penalties, in such a manner as shall take it out of the hands of the *Treasury*, and form a check even on the *House of Commons* itself."[2]

After the outbreak of the War of Independence Price's fears naturally became intensified and he attacked the policy of borrowing at a low rate of interest and thereby increasing the capital of the debt beyond the actual sums received. He compared[3] the financial methods of the French with those adopted by Lord North—"We lose sight of the capital in the interest, they carry their views chiefly to the reimbursement of the capital." And it was about this time that he suggested the evil might be undone by upward conversions of three per cents. into three and a half per cents.[4]

---

[1] A scheme of Lord North's, of which nothing further was heard.

[2] *Observations on Reversionary Payments*, Preface to 3rd Edition, p. xxv.

[3] *Additional Observations on Civil Liberty* (1778), p. 153.

[4] Cf. *Additional Observations on Civil Liberty*, pp. 209–14.

Price had been for some years a friend of Lord Shelburne, and he put before him a plan which was referred to in the King's Speech of 1782. But the fall of the Government postponed for a time the introduction of any policy of debt reduction. Meanwhile the idea of converting stocks bearing a low rate of interest into stocks bearing a higher rate of interest seems to have occupied in Price's mind a position as important as that held by his conception of a cumulative sinking fund. The plan which he had laid before Shelburne[1] had involved in the first place the realization of a clear surplus of £1,000,000 which would necessitate, according to his calculations, additional taxation to the extent of £2,500,000 and would raise the revenue to £15,000,000. This surplus would of course be applied cumulatively to the repayment of debt. The remainder of the plan, however, rested entirely upon a conversion scheme which would transform the existing three per cents. into a new 4 per cent. stock. On payment of £104 in cash the holders of the threes were to be offered in exchange for £100 stock £200 of 4 per cent. stock, this new stock to possess priority of redemption when under par, but when above par to be irredeemable so long as any of the old 4 per cent. stock should be unredeemed. Price imagined that new loans might be negotiated on these terms and that thereby an increase in the funded debt beyond the sums actually received from the lenders would be avoided. But he also hoped that his plan might be incorporated in a general scheme of debt reduction. He maintained that "by repeating these operations and borrowing, instead of a million, three or four millions annually, all the 3 *per cents.* might, in the course of a few years, be converted into four *per cents.*, and at the same time a capital of £34,000,000 cancelled."[2] The funded debt, allowing for the funding of £25,000,000 floating debt and deducting the £34,000,000 cancelled, would amount to nearly £183,000,000 of four per cents. which could be redeemed by a cumulative sinking fund of £1,000,000 per annum in fifty years. In making this proposal Price again displayed the emphasis which he placed on the capital of the debt and its redemption and the relative indifference which he felt about the rate of interest on that debt. Thus it is

[1] *The State of the Public Debts*, pp. 19–32.

[2] *Ibid.*, p. 29.

not surprising to find him shocked at North's view "that the public debt is to be considered only as an annuity" and "that it does not signify what the capital is." Of upward conversions he approved for two reasons. First, they would provide sums towards the redemption of the capital of the debt; secondly, by creating a higher rate of interest on the remaining debt they would accelerate the operation of the sinking fund. The scheme appears, however, to suffer from a lack of inducement to the holders of the 3 per cents. to make the suggested conversion. The threes then stood according to Price's own calculation at 68. Thus the stockholder would have been required to sacrifice a security with a fairly remote risk of conversion and to make a cash payment of £104 in exchange for a new security yielding on the whole a slightly higher rate of return, but with definite prospects of conversion in the near future. Price himself appears to have been aware of the difficulty and proposed to make an addition of ⅛ per cent. to the interest of the new fours for a period of seven years as an equivalent for the profits of a lottery. But he was sufficiently confident about the success of his scheme to expect that there would subsequently be a conversion of the fours into a security bearing a still higher rate of interest.

Price's work on finance has been criticized chiefly by persons who have confused his proposals with the actual operation of the sinking fund during the Napoleonic Wars. Price himself appears to have been fully aware of the necessity, in the case of a borrowed sinking fund, of imposing taxes to meet the interest on the loans which would be raised. Thus in his *Appeal to the Public* it is said that "A State may without difficulty redeem all its debts by borrowing money for that purpose . . . and without providing any other Funds than such small ones, as shall from year to year become necessary to pay the interest of the sums borrowed."[1] In the Preface to the Second Edition of the *Appeal* he says more precisely that he intends to show "that to alienate a fund appropriated to the payment of public debts while it can be avoided by borrowing money at simple interest on new taxes or savings is a most pernicious measure." Finally he announces:

---

[1] *Appeal to the Public*, 1st Edition (1772), pp. 15–16.

> "It has been lately urged to me, that all taxes for paying the interest of sums borrowed to avoid alienation, *might* be brought to the fund and there improved in paying debts at compound interest. . . . This is undoubtedly true and . . . were this done there would be no harm in alienation. But the inference which has been drawn is that alienations can do no harm when this is *not* done." [1]

Nevertheless, although Price did not fall into some of the errors which have been attributed to him, scarcely anything can be said in his favour. He did not even originate the conception of a cumulative sinking fund, and the applications of the principle which he suggested were definitely misleading. Thus in speaking of the propriety of "making up the necessary surplus by small annual loans" he declared, "I know this is an idea which will be ridiculed." But even this consideration did not deter him from asserting that "the truth is, that by *borrowing only*, any amount of debts (including the sums borrowed) may, in time, be discharged by a sinking fund never diverted." [2] He thus laid the emphasis upon borrowing instead of upon the taxation which would be required if the fund were to be in the least degree effective. There was, however, a further objection. The policy of borrowing to maintain the sinking fund was not only, as Price himself appears to have recognized, unnecessary but also wasteful. The fund could have been managed at less expense if the machinery of borrowing and repaying had been omitted.

The application during the Napoleonic Wars of Price's proposals has only served to intensify a discredit which was not undeserved in the first place. The necessity of imposing taxation was not unnaturally overlooked and the interest as well as the principal of the fund was borrowed. Thus debt accumulated at the same rate at which it was discharged. The one really valuable element in Price's doctrines—the undesirability of borrowing much below par in a stock of low denomination—was completely ignored. No serious or persistent attempt was made to introduce a four or five per cent. security upon the market. Thus these doctrines became finally perverted into the popular notion that debt could be redeemed simply by the operation of compound interest.

---

[1] *Appeal* (2nd Edit.), pp. 83–4. Compare also "the disagreeable necessity of laying on a new tax," *ibid.*, p. 11.

[2] *Postscript to the State of the Public Debts* (1784), pp. 13–14.

Many of these points were actually raised at the very time at which Price was writing.[1] In a letter to Price,[2] published in the same year as that in which his *Appeal* appeared, the implications of his doctrines were attacked. "The doctor seems to speak of a *Sinking Fund* as a spring or fountain, whereas at best it is no more than a reservoir, which depends entirely upon other springs or sources; when they are stopt or cease to flow, the reservoir of course is speedily drained and continues empty and useless."[3] Price, it was argued, had calculated the effects of compound interest on the sum set apart, but had neglected to make the same calculation for the sum borrowed to maintain the sinking fund; "by that means you may discharge any debt or raise any fortune, let the extent of the sum be what you please."[4] The writer then proceeded to criticize Price's statement that, whereas in private life to borrow in order to redeem debt "would be justly deemed absurd," such conduct on the part of the State "would be the effect of the soundest policy." In both cases the policy was absurd, and the absurdity had only escaped Price's attention in the second case because it was there obscured by the influence of taxation. If Price meant that the interest on the sums borrowed should be defrayed from taxation he was begging the whole question. Under such conditions there was no need to resort to borrowing at all; the nation would in fact lose by doing so. Here, in a tract published forty years before Hamilton's celebrated work on the National Debt, may be found a statement of the principle that "where the outgoings exceed the income there can be no such thing properly as a Sinking Fund." Again, in a Tract[5] entitled *Considerations on the Annual Million Bill and on the Real and Imaginary Properties of a Sinking Fund*, published in 1787, it was clearly laid down that "to reduce our debts a clear surplus or excess of the revenue above the expenditure must be provided. Such a surplus can only be created two ways—by taxes or by savings."

---

[1] Cf. also North's Budget Speech, 1781; Sir J. Sinclair, *History of the Public Revenue of the British Empire*, Part II, p. 127 *et seq.*

[2] *Extracts from a Tract entitled the Challenge or Patriotism put to the Test in a Letter to the Rev. Dr. Price by Jos. Wimpey;* see McCulloch's *Select Collection of Tracts on the National Debt and Sinking Fund* (1857).

[3] McCulloch, *Tracts*, p. 366.

[4] McCulloch, *op. cit.*, p. 370.

[5] Quoted in McCulloch's *Tracts on the National Debt*, pp. 403–24.

In 1786 definite steps were at last taken to put Price's proposals into practice. Pitt, who was then Prime Minister and Chancellor of the Exchequer, had written to Price [1] informing him that "the situation of the revenue" indicated that the time had arrived for the establishment of an effective sinking fund. He also stated his approval of Price's scheme for converting 3 per cent. stocks into stocks bearing a higher rate of interest, and put forward a plan of his own on these lines. Pitt's plan [2] involved the conversion of 107⅓ millions of 3 per cents. into 74½ millions of 5 per cents., the terms of the conversion being £69 10*s*. stock in the latter for £100 stock in the former. Price objected to this plan and in reply laid before Pitt three plans of his own.[3] His first plan required (*a*) a surplus of 1 million per annum assisted by the falling in of temporary annuities, life annuities, etc., as the basis of a sinking fund; (*b*) the conversion of 60 millions of 3 per cents. into 4 per cents., £600,000 per annum having to be found in the first five years for paying the difference in interest. His second plan followed the first half of the first, but required the £600,000 per annum to be added during the first five years to the million surplus through new taxes or savings, *without* conversions. His third plan was simply equivalent to the first part of the first plan.

Price definitely favoured the first plan, but Pitt adopted the third, which was regarded by Price as the weakest of the three. Evidently Pitt did not think it practicable to secure the extra £600,000 (either by taxes or economies) which the first and second plans necessitated.

The sinking fund established by Pitt in 1786 was intended to be derived from a clear surplus of revenue over expenditure. A Committee of the House of Commons had reported that the revenue of the country amounted to £15,397,471, and had estimated the permanent expenditure at £14,478,181, leaving a surplus of £900,000. Pitt proposed to levy additional taxation to the extent of £100,000, by imposing an additional duty on spirits, a duty upon woods and a duty upon perfumery and hair powder. He would thus gain the necessary annual surplus of £1,000,000 which would form the basis of a cumulative sinking fund. But the fund was not to continue accumulating until the whole debt should have been redeemed. In twenty-eight years it would amount to £4,000,000 per annum, and when it had reached that point the operation of the cumulative principle should not apply to future purchases of stock. In other words, when the time should arrive at which £4,000,000 per annum were being devoted to the redemption of debt the dividends on stock subsequently redeemed should not be applied to the purchase of fresh stock, and debt should be cancelled as it was bought up.

---

[1] Cf. W. Morgan, *A Review of Dr. Price's Writings on the Subject of the Finances of this Kingdom*, p. 19.

[2] A *Review of Dr. Price's Writings*, p. 20.

[3] *Review*, Ch. II, pp. 24–34.

However important the principle of the cumulative sinking fund may have been, Pitt would probably have considered that his claims upon the gratitude of posterity should rest rather upon the machinery which he devised to safeguard the application of the fund. He believed that he had made any raiding of the fund impossible by entrusting the working of the scheme to a body of Commissioners who would apply the sums they received to the purchase of stock and would subsequently apply the dividends on the stock so redeemed to the purchase of additional stock. Thus to a large extent the machinery of the fund was taken out of the hands of Parliament and the invariable operation of the cumulative principle seemed practically secured. It appeared at least extremely unlikely that any future Chancellor of the Exchequer would be able to induce Parliament to abandon the whole scheme, and short of that no raid on the fund, it might be supposed, could take place. Yet no scheme is completely watertight, and it is clear that Parliament as a sovereign body could have suspended the application of the annual million which was first charged upon the "surpluses, excesses and overplus moneys" constituting the Old Sinking Fund, and afterwards in 1787 upon the Consolidated Fund. In point of fact Parliament did not do this, simply because the fund continued to operate throughout the Napoleonic Wars until its absurdities became so glaring that the whole system was abandoned. Nevertheless, it should be evident that Pitt only devised machinery which would secure the inviolable application of the dividends of the redeemed stock.

In some quarters the view was definitely expressed that Pitt had not provided sufficient safeguards for the inviolable application of his sinking fund. Fox asked, "What should hinder a future minister in a future war from coming down to that House and proposing to repeal the Act authorizing the institution of the committee?" Stanhope suggested that a future minister engaged in "any wild project or absurd war" would repeal Pitt's Bill and seize "the free revenue" of the sinking fund. Both alike distrusted the Commissioners. Fox spoke of them as "private stockbrokers with the public money," and Stanhope thought that they would manipulate the stocks in their own interests.

Nevertheless, the only practical point which Fox secured as a result of the debate was the acceptance by Pitt of his proposal that the Commissioners should be empowered to subscribe, out of the sums which they were to receive, to any new loan which might be negotiated by the government. Fox had criticized the scheme on the ground that the fund would be inalienable in time of war, and Pitt had replied that this was the great merit of his sinking fund. Subsequently, however, he admitted Fox's argument and even pointed out the savings which would arise if the Commissioners subscribed to any new loans that might be required.

The influence of Price went beyond the adoption by Parliament of a sinking fund accumulating at compound interest. His proposals for converting 3 per cent. stocks into stocks bearing a higher rate of interest evidently attracted considerable attention. Pitt, it has been seen, formed a plan of his own along these lines and was only induced to abandon it by the objections which Price raised. Stanhope, in his *Observations on Mr. Pitt's plan for the Reduction of the National Debt*, again raised the question of the desirability of introducing upward conversions of stock. He objected to Pitt's sinking fund on the ground that it would "put the nation to a most enormous expence in redeeming the capital of the present 3 per cents."[1]

---

[1] *Observations*, p. 8.

The purchases of the Commissioners in the market would force up the prices of the stocks in question and the 3 per cents. which then stood below 70 would on the average be redeemed at 90. Such a policy, Stanhope argued, was utterly ruinous. As fast as you redeemed debt the rise in the price of stocks on account of the Commissioners' purchases would leave the aggregate market value of the stock unreduced. He therefore proposed that holders of threes should be entitled to convert into a new 4 per cent. stock, £300 of this stock to be given in exchange for £400 of 3 per cent. stock.[1] He ignored Walpole's thesis that the aim of every stockholder was to be paid off not first, but last, and actually proposed that the inducement to convert should be a guarantee of priority of redemption. This guarantee would consist of three parts[2]—first, that no part of the "free revenue" of the sinking fund should be used for any other purpose than for the redemption of the National Debt; secondly, that the new 4 per cents. should be redeemed before any other stocks; thirdly, that the 3 per cent. holders who refused to convert would be paid off after every one else. The plan would also secure an object of supreme importance—the inviolable application of the sinking fund. The arrangement would in fact involve a contract between the State and each 4 per cent. stockholder, securing him redemption in a definite order of priority. This contract would be as sacred as that under which the State paid to the public creditor his annual interest and its violation would be as improbable as a refusal of the State to meet the dividends on its stocks.

It is, however, by no means clear what Stanhope understood by his conversion scheme—superficially there would appear to be little attraction to a holder of 3 per cents. to sacrifice £100 (nominal) of stock in return for a guarantee of priority of redemption. The author must have imagined that the guarantee would possess a definite value in the eyes of the public creditor; although he probably would not have gone so far as Sir John Sinclair, who, in proposing to redeem in order of lot one-tenth part of the stocks of consentient holders of the three per cents. at the rate of 75 per cent., was prepared to remind the "selfish" creditor that conditions might arise in which it would be improbable that he would see his capital again.[1]

---

[1] *Observations*, pp. 15–16.

[2] *Ibid.*, pp. 18–20.

Proposals of this sort were naturally put forward at this time in view of the price of the 3 per cents. It was felt that however sound in principle the sinking fund might be, its advantages would in practice be considerably reduced if the Commissioners' purchases were going to force up towards par 3 per cent. stocks which then stood round about 70. Some arrangement in the shape of an upward conversion was apparently necessary if the State was not going to have to pay back to the stockholder much more than it originally received from him. In the schemes which were put forward, however, the necessary inducement to the holders of threes to convert into a 4 per cent. stock was generally lacking. No attempt was therefore made to alter the denomination of the debt.

A genuine sinking fund, however, had at last been instituted.[2] £250,000 was to be paid quarterly to the Commissioners of the National Debt[3] to be by them applied either to the redemption of stock standing at or above par or to the purchase of stock standing below par. The dividends on stock thus acquired were in turn to be devoted to the acquisition of additional stock, and the fund was to be supplemented by annuities which fell in either through the failure of lives or the expiration of the terms for which they had been granted. But the operation of compound interest was to be limited as soon as the annual sum should reach £4,000,000. When such an annual sum had been attained the dividends on stock subsequently purchased by the Commissioners were not to be applied to redemption of debt.

Probably something more was present to Pitt's mind than the laudable object of a reduction in the amount of the National Debt. The prices of public stocks were disturbingly low, and whatever view might be taken of the future it was desirable to raise them. If a period of peace should occur, conversion operations might be undertaken; if another war should break out, fresh borrowing would have to be resorted to and the conditions for such borrowing should be rendered as favourable as possible. Pitt had already achieved a good deal in the way of restoring public credit. He had dealt with the legacy of floating debt inherited from the War of Independence by considerable funding operations. In 1784 he had funded £6,397,900 of Navy and Victualling Bills at £107 10*s*. 6*d*. per cent. in a new 5 per cent. stock;[1] in 1785 a further £9,865,941 18*s*. 4*d*. of Navy, Victualling and Ordnance Debt had been funded by the creation of £10,990,651 10*s*. 4*d*. 5 per cent. stock. But this new stock was irredeemable until twenty-five millions of debt in the 3 per cents. and 4 per cents. should have been redeemed. The immediate aim of debt policy must therefore lie in a redemption of the threes and fours, and the weapon was to be found in the new sinking fund.

---

[1] *History of the Public Revenue of the British Empire*, Part III, pp. 275–9. In the Lords Stanhope produced a plan for paying off the threes at 90.

[2] 26 Geo. III, c. 31.

[3] A body consisting of The Speaker of the House of Commons, the Chancellor of the Exchequer, the Master of the Rolls, the Accountant-General of the Court of Chancery, the Governor and Deputy Governor of the Bank of England.

On the other hand, in his general view of financial policy and debt reduction, Pitt was obviously under the influence of Price's doctrines. When the war with France broke out in 1793 the question was not simply one of comparing the advantages to be derived from maintaining the sinking fund (as, for example, the probability of inducing the country to stand a larger amount of additional taxation than it would otherwise have been prepared to submit to) against the manifest disadvantages of trying to pay off debt when no real surplus of revenue over expenditure existed. Pitt believed that a peculiar virtue was attached to the maintenance of a sinking fund in operation during a war. There is no reason to doubt his acceptance of Price's argument that, owing to the higher rate of interest prevailing during a period of war, the cumulative sinking fund would effect a much bigger reduction of debt at such a time than during an equally long period of peace. During the war the sinking fund was rigidly maintained and no use was even made of "Fox's clause," allowing the Commissioners to subscribe to public loans.

In 1792 the principle was still further extended. In the first place £400,000 was issued to the Commissioners in addition to the annual £1,000,000 which they already received.[1] Secondly, provision was made for a special sinking fund on fresh loans at the rate of 1 per cent. per annum on the nominal capital of the loan, the dividends on the stock redeemed to be added to the sinking fund. This sinking fund was to be kept distinct from the fund established in 1786.[2] Thirdly, the savings arising out of conversion operations on the debt were to be added to the original sinking fund.[3]

---

[1] 5 per cent. Navy Annuities.

The arrangement by which a sinking fund of 1 per cent. was to be attached to any fresh debt that might be incurred was obviously intended to extinguish such debt in a period of forty-five years, since it was not to be created in cases where provision had already been made for paying off the capital of the loan in that period of time. If the loan were to take the form of the creation of life annuities or of terminable annuities with a longer duration than forty-five years, a calculation was to be made of the value of these annuities at the end of forty-five years, taking interest at 3 per cent., and a sum amounting to 1 per cent. of this computed value was to be issued to the Commissioners. The conception of a bargain with the public creditor seems to play a large part here : the security for the application of these special sinking funds obviously rests upon the principle that a suspension of them will be equivalent to a breach of contract with the stockholder. Some concession was thus made to Stanhope's argument that the sinking fund should be made inalienable through the invention of machinery which would make its application as definitely a matter of contract as the payment of interest on stock.

From its institution in 1786 until the year in which war with France broke out the annual million sinking fund had redeemed £10,242,100 in the 3 per cents., which had touched their highest point (96) in 1792. The total sums paid amounted to £8,147,631 and the annual interest accruing on the stock purchased was £307,263.[4] It is quite clear that the aim of sinking-fund policy at this time was to force up the price of the 3 per cents. The Act of 1786 had stated that stock might be redeemed by the Commissioners at or above par in accordance with regulations to be laid down in the future, but it had itself definitely prescribed the conditions under which stock should be purchased below par. No regulations were laid down concerning the redemption of stock at or above par, and as the 4 per cents. stood above par at the beginning of 1791, the intention plainly was that the Commissioners should buy up the 3 per cents. This policy met no doubt with the disapproval of persons like Sir John Sinclair, who held that the State should not " purchase the claims of creditors at the price they bear in the market," but should bargain with them " on fair and equitable terms for the extinction of their debts." On the other hand, it definitely helped to raise the price of those stocks which commanded the widest market (the Three Per Cent. Consols and the Three Per Cent. Reduced), and thereby made possible the negotiation on favourable terms of fresh loans which would be required on the outbreak of war.

---

[1] This additional annual grant became £200,000 for 1793 and for each year up to 1802 when it was made permanent.

[2] 32 Geo. III, c. 55, § 3.

[3] *Ibid.*, § 2.

[4] Year ending 1st February 1793.

What part the prospect of war plays in the calculations of a Finance Minister is a question which it would be difficult to determine even in the light of the special political and economic circumstances of the time. His scope of action is at any rate limited by the public's realization of the necessity of providing against an emergency and its readiness to act upon that realization. In this respect the period which elapsed between the close of the War of Independence and the outbreak of the War with France was most suitable for the inauguration of a vigorous debt policy. The American War had brought about an enormous increase in the funded debt and the impression which it created was reinforced by the writings of Price. Price had declared [1] that the doctrine that there payment of the public debt had now become impracticable must lead to bankruptcy. He had insisted on the necessity of reducing the debt by the operation of an effective sinking fund and of preventing any increase in the nominal capital beyond the sums actually received by the State. It was clear that in the not unlikely event of the country being involved in another war, borrowing would again be resorted to on an extensive scale and the public bankruptcy, so often threatened, might at last become a necessary result of the financial situation. Hence Pitt was able to introduce his sinking fund at a time when it might have been expected that he would be unable to resist public demands that his million surplus should go in relief of taxation.

---

[1] *The State of the Public Debts and Finances* (1783), p. 34.

CHAPTER VII

THE WAR WITH FRANCE—I

A distinction has usually been drawn between the financial policy which was adopted from the outbreak of war with France in 1793 to the peace of 1802 and the financial policy which was pursued from 1802 until the close of the war in 1815. The chief ground for this distinction is sought in the existence of an income tax which, though instituted in 1799, did not become effective until after 1802. Such importance has indeed been attached to this fact that it has even been maintained that if Pitt had imposed the tax in 1793 no loans would have been needed to carry on the war.[1] Nevertheless, so far as the details of debt policy are concerned, there was substantial continuity throughout the whole war. The sinking funds instituted in 1786 and 1792 were maintained with hardly any serious modification until 1813; the principle of borrowing in a stock of low denomination was adopted at the outset and continued during the whole period. The justification for making the distinction here rests therefore upon the relations between general financial policy and the rate of growth of the National Debt.

Between 1793 and 1802 the debt was more than doubled. The following table shows the growth of the funded debt of Great Britain and Ireland from year to year:[2]

	Great Britain £	Ireland £
1793	232,064,743	1,969,973
1794	244,936,322	2,940,913
1795	297,391,899	4,469,405

---

[1] Sir H. Parnell's speech, 11th July 1828, *Hansard*, New Series, Vol. XIX, p. 1681. Gladstone's speech, 18th April 1853. Cf. also Hume's Resolutions relative to the National Debt and Sinking Fund, 25th July 1822.

[2] P.I. & E., ii, pp. 304–7. This table refers to the *unredeemed* capitals of the funded debt.

	Great Britain £	Ireland £
1796	349,946,797	5,376,974
1797	375,159,541	6,366,294
1798	406,829,152	8,107,180
1799	413,543,042	9,824,504
1800	435,145,465	12,001,698
1801	485,183,800	11,859,688
1802	508,924,557	13,307,229

The unfunded debt, however, showed an almost negligible increase :

	1793 £	1802 £
Great Britain	12,656,233	14,349,500
Ireland	1,183,485	1,071,722

The total debt charge for the United Kingdom which in 1793 was £9,711,238, had risen by 1802 to £20,268,551.

Responsibility for part of the increase both in the funded debt and in the debt charge must be traced to the financial methods which were pursued.

Throughout the period the sinking fund which had been established in 1786 was maintained in full operation. Nor was any use made of the clause authorizing the Debt Commissioners to subscribe to any loans which might be negotiated.[1] As no genuine surplus existed the sums required had to be borrowed, and the expenses connected with the raising of loans for the purpose of repayment of debt had to be incurred. The 1 per cent. sinking fund created in 1792 was maintained only until 1798 ; the loans of 1798, 1799, 1800 and 1802, amounting in all to £86,796,375, had therefore no special sinking funds attached to them.

The funded debt was considerably increased by the policy of borrowing in stocks of low denomination (3 per cent. Consols and 3 per cent. Reduced) instead of in 4 and 5 per cent. stocks. From 1st February 1793 until 25th March 1802 the capital of the debt was increased by £336,000,000 while £223,000,000 were actually received.[1] Thus, to take the case of a loan which was negotiated in February 1801, for £100 cash subscribers received £125 in 3 per cent. Consols and £50 15*s*. in 3 per cent. Reduced; the sums received amounted to £28,000,000 and the addition to the funded debt was £49,210,000. That this policy was justified in the light of immediate considerations can hardly be denied, but the attempt which has been made [2] to justify it on more general grounds appears to have ignored certain more remote considerations.

---

[1] Apparently it was intended that the Commissioners should subscribe £1,650,000 to the loan of 1793, but the measure was abandoned on the grounds : (*a*) that the purchases of the Commissioners kept up the price of stocks, and (*b*) that it would postpone the period at which the 5 per cents. would become redeemable. Cf. W. Newmarch, *On the Loans raised by Mr. Pitt during the First French War*, p. 67.

A loss was undoubtedly involved in the maintenance of the sinking fund out of borrowed money. In the first place, expenses of brokerage were incurred in the raising of loans and in the purchase of stock. Secondly, in so far as a premium was given to the loan contractors an additional loss was involved, the price at which the stock was offered being lower than the price of the stock purchased. The answer to such criticisms as were made of these arrangements usually took the form of a claim that the purchases of the Commissioners kept up the prices of stocks and thus enabled loans to be negotiated on more favourable terms than would otherwise have been secured. But to this answer there was an obvious objection. The necessity of borrowing in order to supply the Commissioners with funds tended to lower the prices of stocks, so that the results achieved by their purchases were entirely illusory. No advantage could be lost if both sides of the transaction were wiped out: in fact a gain would be secured by the abolition of the charges involved in borrowing and repaying.

A good deal of the subsequent criticism of the borrowed sinking fund has, however, been based on a fundamental misconception. It has been argued [3] that the State was borrowing at a high rate of interest in order to pay off debt contracted at a low rate: and the losses arising out of this policy have been represented as enormous. Those who have urged this view have overlooked the fact that when the State paid off debt it did not redeem it at par but bought it up at the market price.

---

[1] Newmarch, *op. cit.*, p. 75: compare p. 2.

[2] By W. Newmarch in *The Loans raised by Mr. Pitt during the First French War.*

[3] *Vide infra*, p. 137.

A policy of borrowing in 3 per cents. at 60 in order to redeem 3 per cents. at par would obviously have been ruinously expensive. But nothing of this sort occurred. The State borrowed at 72 and bought up stock at the market price of 77.

Moreover, if the prospects of conversion be taken into consideration it becomes evident that advantages may be derived from the policy of issuing, say, a 5 per cent. stock at 95 in order to buy up 3 per cents. at 60. And these advantages must be set against the losses incurred in borrowing and repaying. No such policy was pursued, however, during the Napoleonic Wars: the greater part of the borrowing took place in threes. Thus the expenses of the borrowed sinking fund were in no way offset by the possibility of future savings in interest.

If taxation had been imposed to meet the charge of the loans that were raised the sinking fund would have done its work. The real flaw in the system lay in the policy of borrowing to meet the interest on loans. The cumulative principle never had a chance to operate, because the interest that was paid to the Commissioners was derived not from taxation but from the proceeds of borrowings.

In fact the only serious defence that was put forward on behalf of the sinking fund was based upon the claim that the nation was induced by the existence of such a fund to bear a heavier burden of taxation than it would otherwise have endured. This claim can only be accepted, however, with a good deal of qualification. The nation might have borne a heavier burden if the view had been generally accepted that the income of the fund should be derived entirely from the proceeds of taxes. But conditions were entirely unfavourable to the propagation of such a view. Orthodox opinion of the time regarded it not merely as unavoidable but actually as desirable to borrow in order to maintain a sinking fund.

The fact that heavy taxation was imposed during the latter part of the war was primarily due to Pitt's belated decision to avoid the necessity of borrowing on an extensive scale. The influence of the sinking fund was thus only secondary, and the fund counted for no more as an inducement to the public to undergo heavier taxation than did any other item of expenditure.

The policy of borrowing in a stock of low denomination has been attacked on the ground that it involved a considerable increase in the capital of the debt beyond the sums actually received from the lenders. It has been urged that if the loans had been negotiated at a rate more nearly corresponding to the current rate of interest this increase in capital would have been avoided. The answer to this criticism [1] points to the fact that loans in the 3 per cents. could be negotiated on more favourable terms than loans in stock of higher denominations; and even goes so far as to assert that borrowing on an extensive scale in 4 or 5 per cents. would have been impossible.

Prior to the outbreak of war [2] Pitt apparently approved of funding in stocks of a relatively high denomination. In a speech delivered in 1784 he declared:

> "it was always my idea that a fund at a high rate of interest is better to the country than those at low rates; that a four per cent. is preferable to a three per cent., and a five per cent. better than a four. The reason is that in all operations of finance we should always have in view a plan of redemption."

These views were entirely in harmony with the doctrines of Price. Price had severely condemned the funding methods employed during the war with America and had suggested an upward conversion of stock from lower to higher denominations. From the outbreak of the French war, however, the policy of borrowing in the 3 per cents. was maintained with very few exceptions. It was intended, for example, that the first war loan should have been negotiated in a 4 or 5 per cent. stock; but Pitt received tenders from only one set of persons who declared their preference for 3 per cents. Pitt declared that he had done his best to obtain other offers but that he had been unable to "excite competition."

Newmarch, in a pamphlet written in 1855 in defence of Pitt's policy, urged that "(1) it would have been practically impossible to have raised most of Mr. Pitt's loans in the amounts, and at the times required, if the principle of borrowing at par had been enforced; (2) even if the money had been raised in a Five per cent. instead of mainly in a Three per cent.

---

[1] Cf. Newmarch, *op. cit.*

[2] Speech of 30th June 1784; quoted Buxton, *Finance and Politics*, Vol. II, pp. 202–3.

Stock, the difficulties would have been frequently excessive, and in every case the rate of interest, and therefore the annual charge very considerably higher."[1] Thus, according to Newmarch, the first war loan of March 1793 was raised in 3 per cents. at the rate of £4 3*s*. 4*d*. per cent., whereas if it had been negotiated in a 5 per cent. stock the rate would have been £5 2*s*. per cent.[2]

It is evident that the price of the 3 per cents. was invariably higher relatively than the price of the 4 per cents. and 5 per cents.[3] To take two examples, in 1793 and 1794 the prices of the stocks were as follows:[4]

	3 per cents.	4 per cents.	5 per cents.
March 1793 . . .	77	89	104
February 1794 . . .	67	84	101

Nor is it difficult to find an explanation of this difference in favour of the 3 per cents. In the first place, Consols and Reduced Threes represented, as has already been shown, a much larger volume of securities than did the Five Per Cents. and Four Per Cents. There was much wider market in them, and both speculator and investor naturally preferred them. The reason for this state of affairs was partly historical. If the bulk of the British debt had consisted of 4 per cent. stocks the conditions would have been considerably different. The situation depended directly upon the consolidation of the debt in the middle of the eighteenth century in Consols and 3 per cent. Reduced, and ultimately upon the fall of the rate of interest to 3 per cent. at that period. More important, however, was the consideration of the probable movements of the prices of the different securities in the future. If, after the termination of the war, a rise in the prices of the stocks occurred, the threes being proportionally more remote than the fours and fives from the prospect of conversion would offer to their holders the possibility of a greater appreciation. This factor represented probably the chief influence which gave Consols and Reduced Threes the advantage which they held over securities of a higher denomination.

---

[1] *op. cit.*, p. 3.

[2] *Ibid.*, p. 9.

[3] Cf. also Hamilton, *An Inquiry concerning the National Debt* (3rd Edit.), p. 251.

[4] Newmarch, *op. cit.*, p. 9 and p. 11.

This prospect of conversion shows that the argument of Newmarch overlooks some of the elements of the problem. It may be true that so far as the present is concerned borrowing in a 3 per cent. stock means a smaller annual charge than borrowing in a 4 or 5 per cent. security. But when more remote periods are taken into consideration the probable course of the rate of interest cannot be ignored. Thus borrowing in a 4 or 5 per cent. stock, while involving for the time a rather larger annual charge, certainly brings nearer the possibility of conversion by which a reduction of the charge will be effected.[1]

Newmarch also defended Pitt on the ground that circumstances showed that, even had he wished to do so, he would have found it impossible to borrow in any other but a 3 per cent. stock.[2] But it is difficult to believe that, had a serious attempt been made, the loan contractors could have prevented the issue of a 4 per cent. or 5 per cent. security. Pitt claimed that it was his principle to encourage competition as far as possible in the bidding for the loan ; nevertheless, in the first war loan he received tenders from only one group of contractors. In 1795 and 1796 an attack which was directed against him gives some ground for supposing that he found himself at times at the mercy of particular groups of contractors. In the autumn of 1795, after having announced his intention of maintaining " a free and open competition " for a loan of £18,000,000, he suddenly abandoned his principle and gave the loan to the firm of Boyd & Co., who had demanded more favourable terms than another group of contractors.[3] Only in the negotiation of the loan of 1794 did he claim to have achieved success. He then told the House of Commons that

> " he had endeavoured to encourage a free and open competition among monied men, taking care only that the bidders should be of such responsibility as to insure the payment of the first deposit. Five most

---

[1] Nor do the calculations of those like J. J. Grellier (*op. cit.*), who estimated the time in which the saving in the annual charge would at compound interest amount to the increase in capital, throw any light upon this problem.

[2] It has also been pointed out that the Usury Laws presented a legal obstacle to borrowing at any (nominal) rate of interest higher than 5 per cent. ; cf. Bastable, *Public Finance* (1st Edit.), p. 608.

[3] *viz.* 6*s*. 6*d*. as the Long Annuity instead of 3*s*. 6*d*.

respectable sets of monied men had offered, and the effect was such as might have been expected. The terms were highly favourable to the public."[1]

This loan, which amounted to £11,000,000, was raised at the average rate of £4 11*s*. 5*d*. per cent. in Consols, Four Per Cents., and a long annuity.

The methods of borrowing were similar to those which had prevailed in the latter part of the war with America. Loans were not raised in a single stock, but by the issue of two or more stocks together with a long annuity. The items forming the loan were known separately as "Scrip," in combination as "Omnium." The practical importance of the distinction lay in the fact that while instalments on the loan were being paid up by subscribers transactions could take place either in the separate items of stock or in "Omnium"; when the loan had been completed dealings were confined to the separate stocks, such as Consols or Reduced Threes.

Tendering on the part of contractors formed the basis of the negotiation of these loans. Groups of contractors would make offers for a loan, the bidding generally taking place in the long annuity. Nevertheless, on one occasion, in the most serious crisis of the war,[2] Pitt decided to throw the subscription open to the public. Originally, it appears that some form of compulsory loan had been considered, the proposal being that persons with incomes above a certain level should be compelled to lend a sum equal to one quarter of their income.[3] This proposal was subsequently abandoned in favour of an appeal to the patriotic feelings of the nation, and the "Loyalty Loan" was introduced. £18,000,000 was to be raised in a 5 per cent. stock, £112 10*s*. in stock being offered for £100 in cash.[4] The stock was declared irredeemable, except with the consent of the holders, until three years after all the existing 5 per cent. stocks should have been redeemed: but an option was given to the holders to be paid off at par within two years after the conclusion of a definite treaty of peace. The terms of redemption in either case were, for £100 stock either £100 in cash or £133 6*s*. 8*d*. in Consols. The loan seems to have been taken up very readily.[1]

---

[1] *Hansard*, XXX, 1358. Sir J. Sinclair was opposed to the principle of competition and argued that "the proper channels for raising loans seem to me the bankers of the metropolis and their correspondents at home and abroad."

[2] December 1796.

[3] Grellier, *op. cit.*, p. 400.

[4] Equivalent to a rate of £5 12*s*. 6*d*. per cent.

Shortly after the issue the stock fell to a discount, and in May 1797 Pitt contemplated making some provision for the compensation of the holders by granting them in addition a long annuity of 7*s*. 6*d*. per annum. In this proposal, however, a curious confusion of ideas seems to have been at work. The loan had been negotiated on terms which corresponded with the conditions of the money market, and at the same time an appeal had been made to the patriotism of the investor. It might have been expected, therefore, that a fall in the price of the stock would have been regarded either as a factor which should have entered into the calculations of the investor when he made his purchase or as an unfortunate event which he should have been prepared to endure in the interests of his country. The proposal to make him some compensation by the grant of a long annuity ignored both these considerations.

No compensation was in fact made, and no change took place in the conditions of the loan until after the peace of Amiens in 1802, when holders were entitled to demand repayment under the terms which had been proposed.[2] But the State was not prepared to pay off the stock. On the other hand, the holder of Loyalty Loan would have lost by accepting the offer of conversion into £133 6*s*. 8*d*. of Consols. Accordingly an Act was passed in 1804 which entitled him to receive for £100 Loyalty Loan £100 in 5 per cents. and such an additional amount in 3 per cent. Reduced as would at the current price make up £100 in value. Still more favourable terms were offered to holders of £5,703,446 of stock who refused this proposal. They were to be entitled to so much stock in 5 per cents. or 3 per cent. Reduced as would be equivalent to £100, and in addition such an amount in 3 per cent. Reduced as would provide them with a further 10*s*.[3] Thus, although the immediate and pressing needs of the State during the year

---

[1] £2,000,000 were subscribed by The East India Company and £1,000,000 by the Bank of England.

[2] Certain 5 per cent. annuities of 1801 amounting to £2,227,612 had been consolidated with the Loyalty Loan: the whole stock therefore amounted to £22,352,456.

[3] Cf. Hamilton, *op. cit.*, p. 275.

1797 may have been met, it can hardly be said that the ultimate results of this appeal to patriotism were advantageous.

The Loyalty Loan was not, however, simply the last resource of a desperate financial situation. Pitt clearly had in mind the prices of the 3 per cents. which had fallen to a very low level.[1] He did not wish for the moment to raise another loan in Consols or Reduced Threes and thus to depress their prices still further. But his experience in the case of the first war loan had already shown the difficulty which was involved in inducing the contractors to subscribe to a loan which was not based upon the 3 per cents. Hence arose the necessity of an appeal to the public.

Again in 1798 Pitt's desire to improve the market for the threes led him to introduce his scheme for the redemption of the land tax. This tax was to be made perpetual at four shillings in the pound, and provision was made for its redemption by the transfer to the Commissioners of the National Debt of 3 per cent. stock to such an amount as would produce an annuity exceeding by one-tenth the annual amount of land tax redeemed. The 3 per cents. transferred to the Commissioners were not, however, to enter into the system of the sinking fund, and dividends on them were no longer to be paid. The measure had, in fact, a purely negative aim. Pitt apparently hoped that by the arrangement he would be able to take £80,000,000 of stock out of the market.

Nevertheless, the results of the policy were on the whole inconsiderable. During the first two years following the introduction of the measure, when the average price of Consols was 56, £435,885 of land tax was redeemed. But with the rise in Consols towards the close of the war the incentive to redeem was naturally considerably diminished. By 1st February 1817, £25,290,994 of stock had been transferred on which the interest charge amounted to £758,730.[2]

In the details of financial policy Pitt's chief success was achieved in his treatment of that part of the floating debt which was composed of Navy and Victualling Bills : his chief difficulty was encountered in his dealings with the Bank of England.

---

[1] In April 1797 3 per cent. Reduced had fallen as low as 47¾, Consols had sunk to 48¼.

[2] Cf. Hamilton, *op. cit.*, p. 154. By this time easier redemption terms had been offered.

Hitherto the methods employed in the treatment of the floating debt had been such as to add considerably to the costs of financing a war. No definite provision had been made, for example, for the repayment of Navy Bills nor was interest on these Bills paid until several months after they were issued. Hence the Bills were normally at a considerable discount and borrowing in them was extremely expensive. Pitt put an end to this system by making definite provision for the repayment of the Bills within a fixed period from their issue and by securing the immediate payment of interest upon them.

He also showed his intention of abolishing the practice of permitting the floating debt to accumulate unchecked until the close of a war. In former wars borrowing had taken place continuously in Navy and Ordnance Bills, and it had been left for the Government in power at the end of the war to carry out a vast system of funding operations. During the war of 1793–1802, however, a different principle was established, and on four occasions large portions of the floating debt were funded. Hence the outstanding volume of floating debt in 1802 was only slightly larger than it had been in 1793.

In his dealings with the Bank Pitt had to face two groups of problems. First, there was the question of the amount of the debt, in the form of advances, due from the Government to the Bank. As the war continued the Directors displayed a growing uneasiness at the demands made by Pitt upon the Bank and at the amount of the advances by the Bank to the Government, particularly upon Treasury Bills.[1] In 1795 they informed him of their desire " that stipulations for the future advances to be made by them, if necessary, for the payment of Treasury Bills of Exchange be strictly adhered to, as they cannot allow that advance at any time to exceed the sum of five hundred thousand pounds." [2] In spite, however, of these

---

[1] Cf. *Report of Committee of Secrecy respecting the Restriction of the Issue of Specie,* 1797/8. Appendix No. 9.

[2] *Report,* Appendix No. 9. Advances on Treasury Bills were as follows :—

	£	*s.*	*d.*
5th January 1795	2,100,345	9	9
31st January 1795	2,513,762	17	0
31st March 1795	2,263,558	8	7

By 31st January 1796 they had sunk to £1,202,358 2*s.*

representations the total advances grew until in December 1795 they reached the figure of £12,846,700.[1] In this policy there clearly lay the possibilities of a fully developed system of inflationary finance. The actual suspension of cash payments in 1797, however, though influenced by Pitt's financial methods, probably depends ultimately on much wider considerations.[2]

Secondly, the raising of loans both for Ireland and for foreign powers in alliance with Great Britain met with considerable disapproval from the Bank. Fears were expressed as to the effect of these loans upon the state of the exchanges and the export of specie. The Bank displayed its hostility in 1795 to a loan negotiated in England on behalf of the Emperor of Germany guaranteed by the British Government. Its alarm was increased in 1797 when proposals were put forward for a joint loan for Great Britain and Ireland to the extent of £14,500,000 and a further loan to the Emperor of £3,500,000. The negotiation of these loans was, however, probably not sufficient in itself to have produced the monetary crisis of the year. The immediate cause of that crisis was an internal drain created by the alarm felt over the political situation.

Recently some attention has been bestowed upon the question of how far a war can be carried on without resort to inflationary methods. In the war of 1914–18 metallic standards broke down immediately in the belligerent countries and an inflation of credit and currency occurred. The history of the first French war shows that, although considerable demands were made by the British Government upon the Bank of England, nevertheless the metallic standard was preserved intact for four years. For the breakdown of that standard some responsibility must be ascribed to the methods of Government finance and to the policy adopted with regard to foreign loans and subsidies. But it is improbable that without the operation of deeper causes the breakdown would have taken place.

---

[1] Cf. Grellier, *op. cit.*, pp. 389–90. The advances during 1796 were as follows:

	£		£
January	11,292,700	September . . .	10,043,900
February	11,499,700	October	8,946,600
July	10,352,800	November . . .	8,769,000
August	9,306,500	December . . .	10,818,500

[2] Cf. Hawtrey, *Currency and Credit* (3rd Edit), Ch. XVIII.

Pitt's general financial policy has been the subject of much dispute. On the one hand, the attempt has been made to prove that by a more vigorous policy of taxation the greater part, if not the whole, of the war debt might have been avoided. Thus Gladstone maintained that if an efficient [1] income tax had been imposed in 1793, there would have been no necessity for borrowing in order to meet the costs of the war. On the other hand, it has been held that Pitt succeeded in making considerable additions to the amount of taxation which had been levied during the peace, and that it would have been impossible under the circumstances of the time to have induced the nation to stand a heavier burden.

The discussion of historical opportunities, of which advantage was not actually taken at the time, has generally proved fruitless. The problem of the proportions of war expenditure to be defrayed by loans and taxes respectively forms an important part of the theory of public finance; but it is improbable that any valuable conclusions will be derived from a consideration of what might have been done in any given set of circumstances had a different financial policy been adopted. It is no doubt true that at the beginning of a war a more vigorous system of taxation could be adopted than is supposed to be possible at the time. Much more light, however, is thrown on the problems of war finance by a study of the way in which the financial situation actually developed. A study of this sort shows the experimental nature of the financial policy of a period of war. Throughout such a period there is a groping towards new and more efficient forms of taxation. At the same time ignorance as to the limits of the taxable capacity of the nation necessitates continuous consideration of the strain to which the economic system is being subjected.

No sound judgment can be formed upon Pitt's general financial policy which is not based upon a comparison of the proportions between the sums raised by taxation on the one hand and by borrowing on the other. The following table shows the percentages of revenue and loans to total net income:[2]

---

[1] *i.e.* a tax of the same degree of effectiveness as that enforced during the second war.

[2] Reproduced from an article by N. J. Silberling, *Quarterly Journal of Economics*, February 1924.

	Revenue	Loans
1792	69·0	31·0
1793	59·8	40·2
1794	45·7	54·3
1795	36·9	63·1
1796	35·3	64·7
1797	28·8	71·2
1798	42·4	57·6
1799	42·7	57·3
1800	41·5	58·5
1801	34·7	65·3

At the outset there was hardly any serious attempt to meet the costs connected with the war out of taxes. Later, however, Pitt showed his intention of imposing a large amount of additional taxation and of avoiding the necessity of borrowing as far as possible. After the first few years of the war a fairly high proportion of the sums raised were received from the proceeds of taxes. The proportion is not, however, so high as it was during the war of 1802–15; naturally, with the introduction of a more efficient system after 1802 the relative proportion of revenue was larger than it had hitherto been.

Pitt's failure occurred chiefly in his funding policy. The maintenance of the sinking fund in spite of an excess of expenditure over revenue was obviously unsound. Though Price's authority could be claimed on behalf of this system, the amount of criticism which had in fact been directed against a sinking fund operating on these lines ought to have been sufficient to have led to a reconsideration of the whole policy. Nor can Pitt's methods be justified on the ground that he had other objects in view than debt redemption, since it is clear that he accepted Price's doctrines in their entirety.

A consideration of the method of borrowing in the 3 per cents. suggests that Newmarch's views can only be accepted, if at all, with a good deal of qualification. It was a recognized fact that borrowing in Consols or in 3 per cent. Reduced was cheaper than borrowing in stocks of a higher denomination. But a defence of this method which ignores the question of the conversion of debt in the future is utterly inadequate. As a result of this policy, maintained both by Pitt and by his successors, the State was unable on the return of peace to take full advantage of the fall in the rate of interest. The only securities which could in fact be converted were the Navy Five Per Cents., which were dealt with in 1822, and the 4 per cent. Consols, which underwent a reduction of interest in 1824. But these securities represented in 1817 only two-fifths of the amount of debt held in the form of Consols and 3 per cent. Reduced.

The relatively imperfect organization of the capital market certainly presented considerable difficulties to a Chancellor who wished to fund in 5 per cents. But it did not prevent him from borrowing on terms which, though more onerous at the time, would have produced considerable advantages for posterity.

CHAPTER VIII

THE WAR WITH FRANCE—II

In 1802, with the ratification of the peace of Amiens, certain changes were made both in the tax system and in the sinking-fund arrangements. The income tax, on which the loans of 1798, 1799 and 1800 had been charged, was repealed and replaced by permanent duties. The 1 per cent. sinking fund instituted in 1792 had lapsed; no fund of this sort was attached to the loans of 1798, 1799, 1800 and 1802. But henceforward the separate existence of the two sinking funds —the fund of 1786 and the fund of 1792—was to be discontinued. By an Act of 1802 [1] the two funds were amalgamated and the separate accounts ceased to exist. But the amalgamated fund was deprived of two sources of income which the two funds had hitherto enjoyed. It was not to benefit from the expiration of life annuities and terminable annuities, and savings arising from the conversion of debt from a higher to a lower rate of interest were not to be applied to it. On the other hand, the original restriction introduced by Pitt, by which a check was imposed on the accumulation of the 1786 fund as soon as the annual sums carried to the Commissioners' account amounted to £4,000,000, was abolished.

On the whole the sinking-fund system clearly gained by these arrangements. The sums which it would have received through the expiration of life and terminable annuities would not have been large, and the renewal of war postponed for twenty years the conversion of debt. Meanwhile the fund, freed from the restrictions imposed in 1786, continued to accumulate and to receive the dividends on stock purchased by the Commissioners.[2] Addington, who had succeeded Pitt as Prime Minister, maintained that through this alteration the whole debt would be redeemed in forty-five years, a shorter period than would have been possible under the old plan.

---

[1] 42 Geo. III, c. 71.

[2] Moreover, the issue of the £200,000 first granted in 1792 was made permanent.

When war broke out again in 1803 the Income Tax was reimposed under the title of the Property and Income Tax. The rate was at first 1*s*. in the £,[1] but was raised in 1806 to 2*s*. in £. Meanwhile the fresh loans that were required to meet the increased expenditure had attached to them a 1 per cent. sinking fund in accordance with the arrangement of 1792.

With the help of the additional taxation that was imposed a large proportion of public expenditure was met out of revenue. The proportions of revenue and loans to total net income were as follows: [2]

	Revenue Per cent.	Loans Per cent.		Revenue Per cent.	Loans Per cent.
1803 . . .	55·1	44·9	1810 . . .	53·5	46·5
1804 . . .	57·8	42·2	1811 . . .	50·6	49·4
1805 . . .	48·6	51·4	1812 . . .	45·0	55·0
1806 . . .	51·8	48·2	1813 . . .	40·8	59·2
1807 . . .	54·0	46·0	1814 . . .	45·3	54·7
1808 . . .	50·8	49·2	1815 . . .	45·1	54·9
1809 . . .	51·6	48·4			

The burden of taxation was undoubtedly heavy and the prospect of a prolonged war suggested that it was likely to increase. Accordingly, in 1807, Lord Henry Petty, the Chancellor of the Exchequer, produced an elaborate and ingenious plan whereby, assuming a constant war expenditure of £32,000,000, increases of taxation could almost entirely be avoided in the future.[3] Petty proposed to borrow the difference between the war expenditure and the war taxes by a series of loans, for which an annual charge would be incurred amounting to 10 per cent. on the capital of each loan. This charge would be met, however, from the war taxes themselves, and the deficiency thus caused would in turn be met by a series of supplementary loans. These supplementary loans would have a sinking fund of 1 per cent. attached to them, and their charge would be met by new taxes or by the falling in of annuities.

---

[1] On incomes above £150.

[2] Reproduced from an article by N. J. Silberling (*Quarterly Journal of Economics*, February 1924).

[3] *Hansard, Parliamentary Debates,* Vol. VIII, pp. 564–97.

The plausibility of this part of the "new plan of finance" rested partly upon the relief from taxation which it promised, partly upon the apparent adequacy of its arrangements for debt redemption. Petty argued that "for three years not a shilling of new taxes whatever will be imposed upon the country." Meanwhile the annual charge of 10 per cent. on the capital of the loans raised to meet the difference between the war taxes and the war expenditure would provide an adequate sinking fund, which, assuming the rate of interest to be 5 per cent., would redeem each loan in fourteen years from its creation.

The other part of the plan provided for the release of portions of the annual income of the existing sinking fund when that fund should have reached a given level. Petty argued that the growth of the fund in the later years of its operation would cause serious difficulties. The arrangement established by the Act of 1802 would postpone the relief from taxation which the fund was intended to provide to a very distant period (probably somewhere between 1834 and 1844), and would at the same time throw large sums into the money market during the later years of its operation. Moreover, the effects upon trade and prices when the whole debt was redeemed and taxes were taken off would be extremely harmful. Petty accordingly proposed that when the existing sinking fund should have grown by accumulation so far that its annual income exceeded the interest of that portion of the debt existing in 1807 which still remained unredeemed, the excess should be at the disposal of Parliament.[1] This scheme enabled him to propose continued relief from taxation. Between 1810 and 1817 only £293,000 would be required to be raised annually by new taxes, while from 1817 to 1827 the whole of the expenditure would be provided for without the imposition of any further burdens.

Attractive though the plan was, the relief which it offered was due simply to the systematic resort to borrowing which it involved. Moreover, Petty himself recognized that a good deal of uncertainty surrounded his estimate of £32,000,000 for war expenditure, and admitted that additional taxation would have to be imposed if this figure were exceeded.

---

[1] But this free disposal should not be permitted if it would (*a*) prevent the existing (1807) debt from being paid off in as short a time as it would be paid off under the existing arrangements, or (*b*) postpone the redemption of any future loan beyond the period of forty-five years.

The scheme was probably too elaborate to have been consistently carried out and when the ministry fell it was abandoned. Its introduction, however, throws some light on the continuity of financial policy during the Napoleonic Wars.

On some points Petty adhered pretty closely to the arrangements of Pitt and Addington. His plan provided for the disappearance of the income tax after the ratification of peace. He accepted the period which had been fixed for the redemption of debt and also the principle enunciated in 1792 that loans should be paid off within forty-five years of their creation. But his sinking-fund arrangements marked a definite breach with earlier policy. He was prepared to divert part of the income of the established sinking fund when it should exceed the interest on the unredeemed (1807) debt : and he held that the whole debt should be considered as forming one mass and that the sinking fund monies should be applied indiscriminately to the purchase of any portion of this debt.

But the proposal to treat the debt as an undifferentiated mass encountered legal objections. The 1 per cent. sinking fund of 1792 could be regarded as an inviolable agreement under which the State had contracted with the holders of each separate loan to redeem their stock in forty-five years. The loans of 1798, 1799 and 1800 had had no such fund, but in its place Pitt had pledged the imposition of the war taxes until such time as they should be redeemed.

This particular difficulty presented itself in an acute form when a fundamental change of policy was introduced in 1813. The annual amount of the sinking fund, which in 1802 was £5,310,511 and in 1810 £10,904,451, now stood at £13,483,161,[1] and there was a feeling that a check should be imposed upon

---

[1] The state of the sinking fund in these years was as follows :

	Sums Paid £	Stock Purchased £	Interest Accruing £
1802 . .	38,829,567	61,341,912	1,865,355
1810 . .	106,399,567	166,850,945	5,114,498
1813 . .	145,085,607	227,587,400	6,958,350

its further accumulation. Moreover, it was held in some quarters that the nation should at last receive some of the benefits which had been promised to it from the institution of the sinking fund. Probably, however, the biggest influence at this time was the desire to avoid the burden of additional taxation.

Vansittart, who had become Chancellor of the Exchequer in Liverpool's ministry, held that, though there might be no objection to the accumulation of a sinking fund during a period of war when loans were being contracted on a scale larger than the annual amount of the fund, nevertheless it would be found on the return of peace that there was a point beyond which it was undesirable that the redemption of debt should go. Petty had argued in 1807 that an excessive sinking fund would lead to a flooding of the money market with capital for which no employment would be available, and that "the redemption of the national debt at once would be productive of something like national bankruptcy." Whether such a view were to be accepted or not it was still clear that it would be inexpedient at such a time to burden the country with additional taxation merely in order to increase the fund. But under existing arrangements the sinking fund would accumulate until it reached the sum of thirty or forty millions per annum; a result certainly not envisaged by its author. Such a situation could not be permitted to arise. "The plan of employing thirty or forty millions in the purchase of stock in time of peace," Vansittart declared, "is perfectly impracticable and visionary."[1] Moreover, the nation had actually paid more than £200,000,000 in war taxes, a sum considerably in excess of the real value of the debt existing in 1786, and it could claim that, if the stock purchased by the Commissioners were taken into consideration,[2] it had "doubly redeemed the original debt." Vansittart therefore demanded the passing of a resolution that the debt existing on 5th January 1786, amounting to £238,231,248 5*s.* 2*d.*, should be deemed discharged and should in future be cancelled at the direction of Parliament. The loans which had been raised since 1792 would be discharged under similar conditions, in the order in which they had been contracted. For *cancelling* debt elaborate provisions were drawn up, in order that no doubt might be felt as to the Chancellor's intention to maintain, notwithstanding the breach in the arrangements of 1802, the regular application of sums to debt redemption. In the first place, cancellation was not to take place on such a scale as to leave in the hands of the Commissioners sums insufficient to redeem within forty-five years from 22nd June 1802 an amount of debt equal to the whole debt existing prior to that date, or to redeem debt subsequently created within forty-five years from its creation. Secondly, if in any year the amount borrowed should exceed the amount of debt paid off, " an annual sum equal to one-half of the interest of the excess " should be issued to the Commissioners out of the Consolidated Fund ; while upon the remainder of the loan a sinking fund of 1 per cent. should be created in accordance with the provisions of 1792. Given these safeguards, however, debt would be *cancelled* in order to meet the charges of fresh loans that might be raised. Thus in 1813 £46,884,600 in 3 per cent. Consols and £47,892,500 in 3 per cent. Reduced were cancelled in order to meet the charges of the loans of the year. The total amount of cancelled stock in each year from 1814 to 1817 was as follows :

---

[1] *Hansard, Debates*, XXIV, p. 1084.

[2] The stock in the hands of the Commissioners amounted to £238,350,143 18*s.* 1*d.*

	£		£
1814	117,034,500	1816	251,738,858
1815	192,670,991	1817	255,790,138

Certain minor adjustments were also introduced by the financial arrangements of 1813. The loans of 1798, 1799, 1800 and 1802 which had been deprived of the 1 per cent. sinking fund established in 1792 were now provided with such a fund.[1] Moreover, a sinking fund of 1 per cent. was to be created on the outstanding volume of Exchequer Bills which then amounted to about £26,000,000. In normal times the establishment of a sinking fund on the floating debt would be regarded as an entirely unnecessary piece of financial administration, but Vansittart held in 1813 that Exchequer Bills had become " a permanent addition to the public debt."

Vansittart could claim that the arrangement of 1813[2] successfully combined apparently discrepant aims. It provided for that relief from the imposition of fresh taxation which the public had a right to expect. A check was placed upon the indefinite accumulation of the sinking fund which its founder had never intended. On the other hand, safeguards had been devised for the public creditor, and provision had been made for the repayment of debt within forty-five years from its creation.

---

[1] This fund amounted to £870,000.

[2] Embodied in 53 Geo. III, c. 35.

But the sinking fund had not yet come to be regarded with that distrust which developed after the close of the war; and any arrangement which introduced a modification into the system established in 1786 and 1792 and consolidated in 1802 was treated with suspicion.[1] Tierney accused the Chancellor of a breach of faith because under the Act of 1802 the creditors knew "that the Sinking Fund could not be touched until by the accumulation of interest the whole of the debt should be extinguished." It was also argued that the plan was nothing more than using the fund to meet current expenses.

Vansittart apparently felt that to justify his policy he must show that he had considered the safety of the country and that he had not sacrificed permanent interests to the needs of the moment. He replied by pointing out that his scheme afforded in time of peace

> "an opportunity of keeping at the constant disposal of Parliament the means of funding a large sum, to the extent, if required, of 100 millions or more, as a resource eventually to be applied in case of the renewal of hostilities. This was such a treasure as had never been possessed by this country, or by any other."[2]

It is not altogether clear what was intended by this statement. The sinking fund, however modified, could always be regarded in time of peace as a war fund, since it was at any time possible for the repayment of debt to be suspended and for the fund to be used as the basis on which war loans might be raised. There seems, therefore, to be no justification for Vansittart's special claim on behalf of his arrangement. But the statement created suspicions which it was not easy to allay. If ministers really regarded the fund in this light and were contemplating the uses to which it might be put in another war, it was far too dangerous a weapon to place in their hands. After the close of the war these suspicions developed [1] and became an important influence in the movement which finally led to the destruction of the system.

---

[1] The declaration that the 1786 debt had been discharged implied the appropriation to that purpose of sinking funds specifically attached to particular loans raised since 1792.

[2] *Hansard, Debates,* XXIV, p. 1100.

In a debate on the State of the Finances [2] Huskisson attacked Vansittart's proposals and objected to any tampering with the old system. He described the sinking fund as a "perennial resource," "a sacred reserve," and pointed out that in 1809 Vansittart had declared that "the sinking fund cannot be touched with safety to the State as long as the accumulation of debt continues." Vansittart's fears about the redemption of a large portion of debt were not likely to be realized so long as the State was compelled to borrow on a scale far in excess of the amount debt paid off. Huskisson found small consolation in considering the proportion which the fund bore to the unredeemed debt; "the actual amount of the debt ought to be the first object of our solicitude." He accused the Chancellor of "directly breaking in upon the sinking fund and diminishing its effective amount and operation."

Vansittart replied that the right of Parliament to alter the system established for the redemption of debt had been clearly recognized. He was supported by Grenfell, who ridiculed the notion that there had been talk on the Stock Exchange of a breach of faith, and asserted that since the introduction of the proposals there had been no fall in the prices of public securities. It was also pointed out in the debate that the chief fear of the stockholder was not that the sinking fund might be diverted from its original purpose, but that the interest on his capital might not be paid owing to a drying up of the sources of revenue. Vansittart's plan could therefore be justified in so far as it enabled the State to meet its obligations without the imposition of large amounts of additional taxation.

With the return of peace in 1815 a new set of problems arose. At first the question of the monetary standard of the country probably overshadowed the majority of purely financial issues. But it was clear that the settlement of the monetary question would have its reaction upon the financial situation. During the war a depreciated paper currency had been in circulation and the vast loans that had been required had been raised in this currency. If a metallic standard were restored, the interest on these loans and their redemption would have to be met in a currency worth considerably more than that in which they had been negotiated. A country already very heavily taxed might find it impossible to bear this addition to the burden of the debt.[1]

---

[1] Cf. Ricardo's speech, 21st February 1823.

[2] 25th March 1813.

The chief financial issues were associated with the war taxes which had been imposed on the understanding that they would be repealed on the return of peace. For the retention of the taxes, however, there could be urged not only the desirability of securing a surplus for debt redemption but also the necessity of maintaining budget equilibrium. The repeal of the taxes would leave a deficit which even the most ruthless reduction of expenditure could barely cover. But the demand for relief proved too strong to be resisted and the taxes were abolished in 1816.

The loss of income caused by this repeal of taxation was considerable. The abandonment of the income tax meant the sacrifice of a source of revenue which was producing annually over fourteen million pounds.[2] The war malt duty, which was also abolished, was yielding £2,790,000 in 1816.[3] The total sacrifice of revenue was something like £18,000,000, against which Vansittart could only set an addition to the duty on soap. It was fairly clear that the country was not prepared to maintain during a period of peace the gigantic effort with which it had carried on the war.

Vansittart thus found himself in a situation in which borrowing was unavoidable. He decided that the least objectionable measure would be an increase in the floating debt and he proceeded to issue Exchequer Bills. The growth of the floating debt of Great Britain was as follows:

	£
1815	42,229,300
1816	44,463,300
1817	56,974,750

---

[1] *Vide infra*, p. 141 *et seq.*

[2] Cf. Dowell, *History of Taxation*, Vol. II, p. 263.

[3] Dowell, *loc. cit.*

In 1818 Vansittart explained and defended his policy. He declared that the addition to the floating debt was undeniably the result of the repeal of the income tax in 1816. He had been justified in preferring the issue of Exchequer Bills to the creation of stock, since the country had thereby been saved £2,000,000 in two years. Nevertheless, although the accumulation of floating debt since the peace had caused no harm or inconvenience, he was prepared to fund it in accordance with "sound policy" and "the financial principles of the British Government." Considerable reductions were actually achieved and by 1820 the floating debt of the United Kingdom had fallen to £33,350,650.

In 1818 the measure so persistently advocated by Price and Stanhope—an upward conversion of stock—was carried into effect. But Vansittart was not influenced by the suggestions of financial theorists nor by the wish to undo the harm done by funding throughout the war in 3 per cent. stocks. He was actuated by the ordinary desire for some source of revenue which would not involve the necessity of imposing additional taxation. The conversion of stock from a lower to a higher rate of interest promised to yield the income which he so badly needed. Vansittart proposed to create £27,000,000 of a new 3½ per cent. stock, into which holders of 3 per cents. would have the option to convert, and to raise by this operation three millions of revenue. Under the terms which were put forward the holder of £100 stock in 3 per cents. would be entitled to receive £88 stock in 3½ per cents., and upon a payment in cash of £11 a further £12 in the same stock. The result of the conversion was as follows:—

	3½ per cent. Stock created £
£16,945,000 3 per cent. Consols . .	14,911,600
£10,327,000 3 per cent. Reduced . .	9,087,760
£2,999,920 Cash	3,272,640

Vansittart claimed that the measure possessed advantages not only from the standpoint of the raising of revenue but also as a step to future conversion of debt. The new 3½ per cent. stock was to be secured against redemption for ten years and it would therefore assist in the conversion of the fours and fives. He ridiculed the idea that the stock would not be marketable, and argued that the Commissioners of the National Debt would be able to maintain its relative value, since they had "such a command of the money market." He had, however, apparently ignored the terms on which the money had been secured, and it was pointed out by Grenfell that while by this operation he was in fact borrowing £3,000,000 at 4½ per cent., he was at the same time funding Exchequer Bills at a rate practically equivalent to 4 per cent.[1]

The close of the war found the country in a peculiar situation with regard to its debt and its debt policy. The funded debt had undergone a vast increase, but a large portion of it had been redeemed by the operation of the sinking fund. A considerable amount of war taxation had been repealed in 1816, but the nation still enjoyed a larger annual sinking fund than it had ever experienced before. Thus in spite of the immense burden of the debt charge fears could still be expressed as to the danger of repaying debt on too considerable a scale and thereby flooding the money market. Few persons had even yet begun to realize that debt had been repaid by borrowing, and that the amount of stock purchased by the Commissioners was roughly equivalent to the amount of stock which had been sold in order to enable them to make the purchase.

On 1st February 1817 the unredeemed capital of the funded debt of Great Britain amounted to £683,308,573,[2] that of Ireland to £107,380,158, of which £83,944,904 were funded in Great Britain. The total amount of debt redeemed depended partly upon the operations of the sinking fund, partly upon the redemption of the land tax and partly upon a system of granting life annuities in exchange for stock which had been established in 1808. The Commissioners of the National Debt had bought up £291,719,172 at a cost of £183,369,223, £25,290,994 of stock had been transferred in redemption of the land tax and £3,449,955 had been exchanged for life annuities. Public opinion could, indeed, be easily impressed with the statement that the redemption of over £300,000,000 of debt had been achieved, and it was difficult to overthrow a system with the foundation of which Pitt had been so intimately associated. A fundamental change in point of view was necessary before the revolution in policy could be carried out.

---

[1] The bills were funded in a 5 per cent. stock at 79.

[2] Or, including the loans to Portugal, the Emperor of Austria and the East India Company, £692,859,169.

THE UNREDEEMED CAPITALS OF THE FUNDED AND UNFUNDED DEBT, AND THE DEBT CHARGE OF THE UNITED KINGDOM, 1802–17

	Funded Debt £	Unfunded Debt £	Annual Charge £
1802 . . .	522,231,786	15,421,222	20,268,551
1807 . . .	601,733,073	32,073,339	23,373,092
1810 . . .	624,301,937	37,891,919	24,553,162
1813 . . .	740,023,535	48,070,246	29,893,737
1817 . . .	776,742,403	62,639,742	31,591,927

CHAPTER IX

THE ABANDONMENT OF THE SINKING FUND

Whatever view might be held as to the necessity on ordinary fiscal grounds of Vansittart's arrangements in 1813, there could be no doubt that they had damaged the machinery of the sinking fund. They had made it possible for stock to be cancelled at the direction of Parliament in order to meet the charge of new loans ; and they appeared to infringe the contract which had been established between the State and the public creditor in 1792 by the creation of a special sinking fund of 1 per cent. on the nominal capital of each loan negotiated after that date. Yet the original principle was still maintained. So far as the sinking fund continued to operate it was to enjoy the benefit of the application by the Commissioners of the dividends of redeemed stock to the acquisition of additional stock.

The first serious attack upon the general sinking fund policy of the period appeared in a work upon the National Debt [1] by Robert Hamilton, Professor of Mathematics at Aberdeen. Hamilton declared that the only genuine sinking fund consisted in an excess of revenue over expenditure and that all other sinking funds were illusory. He held it desirable to maintain a sinking fund of this sort during a period of peace by securing a revenue greater than the expense of a peace establishment. Such a fund would accumulate at compound interest, and the quantity of debt it would redeem would depend simply upon its amount and the length of time during which it was allowed to operate and upon nothing else. The maintenance of a sinking fund in time of war, on the other hand, was based upon a fallacy. Price's argument that debt was repaid at compound interest and was incurred at simple interest ignored the fact that unless taxes were imposed to defray the charges of new loans borrowing also took place at compound interest. As to the theory that advantages were derived in a period of war from the support which the sinking fund offered to the price of stock, Hamilton asserted: "It is incapable of producing any such effect. The price of stock, like that of any commodity, depends on the proportion of supply and demand."[1] The maintenance of the sinking fund throughout the war had resulted in a loss which, on the very lowest estimate, might be calculated at £16,450,661. The debt contracted between 1793 and 1817 amounted to £874,061,921[2] and would have been only £573,438,388 if no sinking fund had existed. The redeemed debt amounted to £284,172,872,[2] leaving unredeemed £589,889,049. Thus an unnecessary increase of £16,450,661 in the capital of the debt had been incurred simply through the continuation during the war of a policy which was only appropriate to the conditions of peace.

---

[1] *An Inquiry concerning the Rise and Progress, the Redemption and Present State, and the Management of the National Debt of Great Britain and Ireland.* 1st Edit., 1812 ; 2nd Edit., 1814 ; 3rd Edit., 1818.

Of Vansittart's policy Hamilton was on the whole critical. He did not indeed accept the popular criticism that the contract with the public creditor had been violated, because he held that the public debt was rightly treated as one undifferentiated mass and that no special claim to priority of redemption existed among any particular class of stockholders. But he disapproved of Vansittart's proposal to vary the imposition of fresh taxation in accordance with the discharge of debt, on the ground that it would produce all the evils of an arbitrarily fluctuating tax system; and he found quite meaningless the claim that "the principal advantage of the proposed plan in time of peace would be the facility of keeping in reserve a large sum as a resource in the case of renewed hostilities."

Hamilton's work was the starting-point for that volume of criticism which developed in the twenties and at length succeeded in overthrowing the sinking fund in 1828. At the same time the machinery of the sinking fund provided an opportunity for the sort of attack which was levelled against it by Cobbett.[3] If the dividends of redeemed stock had simply gone to the purchase of fresh stock (as occurs, for example, when the principle of a fixed debt charge is adopted), there would probably have been no question as to the straightforwardness of the operation. But in order to prevent the misapplication of the fund an elaborate apparatus had been invented. When stock was redeemed by the Commissioners it was not cancelled but remained standing in their names while the dividends upon it piled up and were devoted to fresh purchases. Here was a fruitful source of popular misapprehension. The nation had redeemed stock and yet this redeemed stock was still in existence and had not been cancelled. Cobbett declared, "There is something so consummately ridiculous in the idea of a nation's getting money by paying interest to itself upon its own stock that the mind of every rational man naturally rejects it."[1] Moreover, doubts were beginning to emerge as to whether debt could really be paid off by borrowing for that purpose.

---

[1] *Inquiry* (3rd Edit.), p. 193.

[2] Reduced to 3 per cents.

[3] For an early criticism of the operations of the sinking fund, see Cobbett's *Political Register*, Vol. III, p. 920.

In 1819 an important change in policy occurred. In a debate in the House of Commons[2] on sinking fund policy Grenfell maintained that the original funds of 1786 and 1792 were based upon an excess of revenue over expenditure; in the previous year, however, while the sinking fund amounted to £15,000,000 the excess of expenditure over revenue was nearly £13,500,000, so that in reality the sum applicable to the redemption of debt did not exceed £1,600,000. "This," he argued, "was creating a new debt for no other purpose than to destroy an old one; selling new stock cheap, in order to buy old stock dear; buying at a very high rate of interest to pay off a debt contracted at a very low one."[3] He urged very strongly the desirability of making use of the clause in the Act of 1786 authorizing the Commissioners to subscribe the sums which they received towards fresh loans.

Vansittart accepted this proposal, having first protested against any suggestion of making "Fox's clause," which was then optional, compulsory, and having repeated the stale argument that the system hitherto pursued had exerted a steadying influence on the price of stocks. In the current year, therefore, a loan of £12,000,000 was secured from the sinking fund, in return for which the Commissioners had £17,152,000 3 per cent. stock placed to their account. The policy was continued and the following sums were received as loans from the sinking fund :

---

[1] *Paper against Gold* (Letter VI), p. 95.

[2] 13th May 1819; *Hansard*, Vol. XL, pp. 347–60.

[3] For a criticism of this view, *vide supra*, pp. 110–1.

	£
1819	12,000,000
1820	12,000,000
1821	13,000,000
1822	7,500,000

David Ricardo in his *Essay on the Funding System* (1820), while expressing a general hostility to the sinking fund, bestowed a qualified approval upon this policy. It had been suggested, he pointed out, that a gain would be secured through the wiping out of both sides of the transaction, by reducing the annual amounts borrowed and by stopping the purchases of stock by the Commissioners. Thereby "all expenses of agency would be saved" and "the premium usually obtained by the contractor for the loan would be saved on that part of it which is repurchased by the Commissioners in the open market."[1] Ricardo, however, preferred Grenfell's proposal. He thought it might be useful to maintain the fiction of the sinking fund in order to induce people to bear a heavier burden of taxation. Nevertheless, behind this approval there lay a deep mistrust of the whole system, since there was no guarantee that the funds thus lent by the Commissioners to the Government might not be frittered away on useless and unnecessary expenditure.

In connection with the first loan obtained from the sinking fund Ricardo had played a not unimportant part ; for while the loan contractors had condemned the scheme, he had declared that borrowing from the sinking fund, though not conducive to his own private interest as a financier, was nevertheless of advantage to the State and would save the public a considerable sum. Ricardo himself had become by this time definitely opposed to the sinking fund[2] however modified. "Our sinking fund," he wrote, "is gone, and I am not disposed to raise a new one for the purpose of placing it again at the disposal of ministers. Do what you will they will not respect it, and after a few years we should be as much in debt as ever."[1] The only difference between himself and Hamilton, he believed, was that Hamilton would maintain the sinking fund, whereas he would get rid of it entirely.[2] A genuine fund he would probably have supported, but he regarded the existing fund as completely delusive and he had no confidence in the integrity of the ministers of the day. He believed that they looked upon the sinking fund as a war fund which they would divert from its original objective as soon as the occasion presented itself.

---

[1] *Works* (ed. McCulloch), p. 529. There is no mention here of the fallacious doctrine that a loss was incurred by borrowing at a high rate of interest in order to redeem stock bearing a lower rate of interest.

[2] In 1816 he had described it as "the general saving bank of the Nation." *Letters to Trower*, p. 15.

Ricardo's own solution of the debt problem consisted in a scheme for a general levy on property.[3] His proposal was naturally treated as quite unpractical by those who did not share his feeling that "the National Debt was an evil which almost any sacrifice would not be too great to get rid of." But he was not without supporters. Richard Heathfield in 1819 published a plan for the redemption of debt by means of "a general contribution in respect of property, including the amount of stock created in favour of the public creditor, and the amount of all other public securities (not being the property of ex-resident foreigners)."[4] Heathfield, working on the estimate of Colquhoun, took the amount of private property in the United Kingdom at £2,500,000,000. To this he added the amount of the funded (£797,401,119 0*s.* 10¼*d.*) and unfunded (£51,992,095 14*s.* 2¾*d.*) debt in private hands, deducting £15,000,000 on account of holdings of foreigners. On the total of £3,334,393,214 15*s.* 1*d.* he would levy a tax of 15 per cent. which would yield £500,158,982 4*s.* 2*d.* This would still leave £349,234,232 10*s.* 11*d.* of debt, but this amount might be paid off by the introduction of conversion operations which could easily be undertaken, by a levy on British Colonial and Asiatic property and on property acquired in the United Kingdom after the date of the first general assessment, by surplus taxes and by other measures.

---

[1] *Letters to Trower*, pp. 74–5.

[2] *Letters*, p. 82.

[3] Cf. *Principles of Political Economy and Taxation* (ed. Gonner), pp. 232–3. Compare *Hansard*, New Series, Vol. VII, p. 655; Vol. VIII, p. 220.

[4] *Elements of a Plan for the Liquidation of the Public Debt of the United Kingdom*, p. 12.

Proposals for the repayment of debt by means of a general levy on property always raise the question, how is the levy to be paid. Heathfield argued that the tax would be taken from the public creditor by cancelling 15 per cent. of his stock: other property holders who were also public creditors would pay in the same way. For those persons who were not holders of public securities "facilities would undoubtedly be presented by floating balances, by monies invested in foreign funds, by monies lent on mortgage, by the early and convenient sale of property, and by other means."[1] But there would still remain certain persons who would be subject to the levy and yet would not possess "any other property than the immediate subject of the assessment." Their case would be met by spreading the payments due from them over a period varying from five to ten years according to the nature of the property which they held.

The reference to the use of surplus taxes to be applied to the redemption of that part of debt which was not cancelled by the levy suggests that Heathfield did not conceive of his proposal as a scheme whereby owners of property would compound for existing taxes. In fact, however, the idea of composition was definitely present to his mind and represented one of the advantages of his plan. The debt, he thought, could be regarded as constituting a mortgage on property to the extent of 50 per cent. The levy itself might be "considered as a composition for Duties and Taxes and other public obligations, *very much exceeding in amount* the rate of composition proposed." The apparently mysterious conclusion—that the relief obtained would very much exceed the rate of composition proposed—is simply reached by adding to the cancelled debt the capital value of the annual sinking fund, reckoned by Heathfield at over £312,000,000.[2]

Of such questions as the distribution of the burden of taxation Heathfield does not appear to have had any conception. The notion that the propertyless should make some contribution to the levy or that property alone did not provide an adequate criterion of ability to pay does not seem to have occurred to him, though there must have been many individuals in receipt of large incomes from work. The assertion that the property of the country was mortgaged to the extent of 50 per cent. suggests, however, that he held the theory that the final incidence of taxation rests upon the owners of property. In the repayment of debt, on the other hand, full justice was to be done. Heathfield was prepared to pay off the stockholder at par and evidently did not accept Ricardo's view that "he will receive a full measure of justice if he is paid at the present market price, of about 70, for his three per cents." Another plan [1] of this period supplied some of the deficiencies in Heathfield's treatment of the levy, but raised at the same time further difficulties. Thus an assessment was to be made of 5 per cent. for ten years only on incomes not arising from property, *e.g.* salaries and the net profits of trade and agriculture. But the public creditors, in addition to suffering a consolidation of their holdings into a new 5 per cent. stock, were to be taxed at the rate of 20 per cent., while other property holders were to pay a levy at the rate of 5 per cent. only, and might convert the assessment into a redeemable income tax if they preferred. Although certain safeguards were provided in connection with the new 5 per cent. stock, the scheme definitely penalized the fundholders in favour of the other classes in the community.

---

[1] *op. cit.*, p. 20.

[2] *i.e.* the capitalization at 5 per cent. of £15,620,503. The actual amount of stock standing in the names of the Commissioners in 1819 was £102,844,826. Cf. P.I. & E., ii, 251.

So far, however, as any question of justice was involved in the payment of the debt, opinion in the post-war period was much more concerned with the effects which had been produced upon the position of the stockholders by changes in the value of money. Loans had been contracted during the war in a depreciated paper currency, but the payment of interest on them and their repayment were now being effected in a currency considerably appreciated and after 1821 restored to metallic parity. Considerations of this sort affected all fixed monetary claims, but the holder of public securities presented a more obvious target for attack. But for the necessity of paying him in gold the interest of sums which he had lent in depreciated paper taxation might be reduced and industry might be relieved from some of the burdens by which it was oppressed. The reply was of course made that the same class of considerations applied to persons who had lent sums to the State before the period of depreciation or in the early stages of depreciation, and had then been forced to accept payment in a paper money worth less than that in which they had made the loan. If an adjustment of claims were to be undertaken those who had raised the issue would find themselves driven back to the beginning of the restriction of cash payments in 1797. There was considerable force in this argument; but immediate difficulties and the existing pressure of taxation naturally caused the emphasis to be laid upon the injustice of the public's being compelled to pay sums greatly enhanced in value owing to the resumption of cash payments.

---

[1] *A Practical Scheme for the Reduction of the Public Debt and Taxation without Individual Sacrifice*, by Jonathan Wilks (London, 1821); cf. also Pablo Pebrer, *Taxation, Revenue, Expenditure, Power, Statistics and Debt of the whole British Empire* (1833); P. B. Shelly, *A Philosophical View of Reform* (first printed in 1920).

J. R. McCulloch in a pamphlet,[1] in which subsequently he appeared to take little pride, maintained that the remedy was to be sought in a reduction of the interest paid on the National Debt. "I have endeavoured to prove," he said, "that a great portion of the paper lent to Government during the late war was *depreciated*, and that if the stockholders are now paid the same *nominal sums* they lent with *undepreciated* paper, they will get an undue advantage at the expence and ruin of the productive classes." [2] It was doubtful whether the interest on the debt could be paid without reduction if cash payments were resumed; but whatever views might be held on this question it was "incontrovertibly just, that if the dividends are now to be paid in *undepreciated* paper, they should be reduced by the difference between the value of paper, and gold and silver, at the time the loans were made." [3] At a later point in his essay McCulloch altered

[1] *An Essay on the Question of reducing the Interest of the National Debt*, 1816.

[2] *Essay*, Preface, i.

[3] *Ibid.*, p. 194.

his criterion and suggested that the interest on the debt should be reduced by the help of a scale which would be based not only on the specific depreciation of the paper currency but also on the " average prices of grain for periods of five years, beginning with 1794," as compared with the basic figure of fifty shillings a quarter, the price to which he thought it would fall if the Corn Laws were repealed.[1] This suggestion obviously depended on the assumption that with the resumption of cash payments the Corn Laws would disappear.

McCulloch was clearly aware of the objections which would be raised to his views on the subject of depreciation. It might be urged in the first place that the State was trying to get the best of both worlds ; it was going to reduce interest when money appreciated but it would not raise interest when money depreciated. The point had to be admitted, but it had no bearing on the current situation. The proposal which had been put forward would not involve any reduction of interest on the debt contracted prior to depreciation. Secondly, it could be argued that the same principle should be applied to private debts. This was true, but the application would be extremely difficult. Thirdly, it might be pointed out that stock had changed hands and that many of those who would suffer a reduction of interest on their holdings might have acquired stock with undepreciated paper. To this really serious objection McCulloch could find no better answer than that " whatever measure is just to the original holder or contractor is just to the subsequent holder."

The case for the stockholder was put by Mushet in his *Series of Tables exhibiting the Gain and Loss to the Fundholder arising from the Fluctuations in the value of the Currency from* 1800 to 1821. Mushet referred to " the constant attempts now made to represent the Fundholder as having derived very great advantage from the circumstance of his now receiving in a currency of standard value, the interest of the capital which he lent to Government in a currency considerably depreciated ; and the wish, not secret but expressed, of a considerable party in the country, to break faith with the Fundholder." [2] Even admitting that the fundholder had gained, he pointed out that money was lent during the war on the "express understanding, that, at six months after a definitive treaty of peace, the currency was to be placed upon its ancient footing as to value."[1] But he was not prepared to admit that the fundholder had in the period as a whole gained at the expense of the public. Arguing from his tables, which were based on a comparison with the market price of gold at different periods, he came to the conclusion that, although the loss to the fundholder upon the loans contracted above the debt redeemed between 1801 and 1820 was £5,440,377[2] and the gain £9,957,009, nevertheless when the loss on the unredeemed debt outstanding at 1st February 1801 was taken into consideration and losses and gains were calculated at compound interest, the total loss to the fundholder would appear as £41,229,446. Interest on this sum at 5 per cent. amounted to £2,061,472; against it could be set a permanent increase of interest due to the restoration of the metallic standard equal to £1,988,768, which would still leave an annual loss of £72,704.

---

[1] p. 208.

[2] *Tables*, pp. vi–vii.

Unfortunately the lack until a much later date of a system of index numbers, whereby the value of money against things in general may be compared at different periods, has meant that a good deal of this discussion is deprived of the interest which it might otherwise have received. We are concerned nowadays rather with the power which the holders of fixed monetary claims possess of controlling a certain volume of goods and services, than with the relation of such claims to a single commodity, even though that commodity be the money metal. The discussion in the period after the Napoleonic Wars only became more confused when those who denounced the injustice of the fundholders' claims, feeling that their arguments needed reinforcement, introduced a reference to the price of grain. Malthus had actually placed the whole emphasis on grain; "even if the price of corn be kept up by restrictions to 80 shillings a quarter," he declared, "it is certain that the whole loans made during the war just terminated will on an average be paid at an interest very much higher than they were contracted for, which increased interest can, of course, only be furnished by the industrious

[1] p. vii.

[2] *i.e.* through receiving interest in depreciated currency.

classes of society." [1] If "a reduction of the price of corn and labour" were achieved, the forty-million debt charge would have to be paid out of a national income equal to about half the nominal value of that of 1813.[2] McCulloch, as we have seen, wished to take an average of the depreciation of paper with reference to the prices of the precious metals, and the prices of grain as compared with a basic figure of 50 shillings a quarter. Cobbett, who had maintained that the funding system was tied up with the issue of paper money and that the dividends on public securities could not be paid if the gold basis of the currency were restored, was still in 1834 arguing the matter in terms of the market price of wheat.[3] If calculations were made on this basis, he argued, it would be found that during the whole period from the beginning of the war up to that time the fundholder had been receiving two-fifths more than he ought to have received. But the "equitable adjustment" was not made, and after a certain time it came to be felt that a settlement which had been possible in 1819, when the whole question of the monetary standard was still an open one, could no longer be carried out.

Meanwhile the Ministry had induced the House of Commons to pass a resolution affirming

> "that to provide for the exigencies of the public service, to make such progressive reduction of the national debt as may adequately support public credit, and to afford to the country a prospect of future relief from a part of its present burdens, it is absolutely necessary that there should be a clear surplus of the income of the country beyond the expenditure of not less than £5,000,000; and that with the view to the attainment of this most important object it is expedient now to increase the income of the country to the amount of three millions per annum." [4]

This was not a very palatable doctrine for a country which had just emerged from a costly war and hoped to see the burden of taxation reduced. The public had imagined that a sinking fund of considerable dimensions existed, but it was now told that the real sinking fund was only £2,000,000 and was quite insufficient. Certainly, in view of the sacrifices which had been made, and the stress which had been laid on the necessity of maintaining the fund intact throughout the war, it was highly unsatisfactory to find that the actual amount available in the year for debt redemption was only one-quarter of 1 per cent. on the total sum outstanding.

---

[1] *Grounds of an Opinion on the Policy of restricting the Importation of Foreign Corn*, p. 41.

[2] *op. cit.*, p. 39.

[3] *Four Letters to the Hon. J. Stuart Wortley*: the best test in Cobbett's view would be the six sorts of English corn along with meat and wool.

[4] Resolutions of the House of Commons, 7th June 1819—*Hansard*, Vol. XL, 915.

Vansittart informed the House that it was now reaping the fruits of its ill-judged repeal of the war taxes in 1816. Revenue had thereby been sacrificed and the sinking fund had been reduced to a level which was quite inadequate either for the redemption of debt or for the protection of the country in any future emergency. He was for the time content with a fund of £5,000,000, but he thought that when the circumstances of the country should permit, it would be desirable to raise the sum to £8,000,000.

The new policy of obtaining loans from the sinking fund had made more obvious the real position of the finances of the country. The sum available for redemption of debt was not £15,000,000, but barely £2,000,000. But the necessity for additional taxation in order to secure an effective fund was not so clear. Vansittart, indeed, in a letter to Liverpool,[1] spoke of "'a surplus of £5,000,000' as the condition of the revenue which was indispensable to the prosperity, if not the safety, of the kingdom." But already the view was gaining ground that enough had been done for the sinking fund and that any surplus available would be better employed in a reduction of taxation than in a redemption of debt.

In spite of the imposition of additional taxation Vansittart's aims were not realized, and in the next four years the surpluses fell considerably below the £5,000,000 which he had proposed. The surpluses of revenue over expenditure were: [2]

	£
1819	552,254
1820	1,463,847
1821	3,183,848
1822	3,377,222

---

[1] See C. D. Yonge, *Life of Lord Liverpool*, Vol. 3, p. 165.

[2] P.I. & E., ii, 715.

In 1822, in his efforts to obtain a surplus along with remissions of taxation, the Chancellor was driven to adopt a policy which was as illusory as the old policy of borrowing to maintain the sinking fund. He proposed to fund the charges for half-pay and naval and military pensions and to secure a surplus consisting of the difference between the expenditure under these headings and the annuity which the State would pay to those who could be induced to undertake the charge. In short, he would convert the liability for half-pay and pensions, which then amounted to £4,900,000 per annum,[1] into an annuity for forty-five years of £2,800,000 per annum.

Vansittart pleaded the justice of spreading this charge which could be regarded as part of the costs of the war, and thus shifting a portion of the burden on to posterity. But he had to meet the very pertinent criticism that in order to create a surplus for the redemption of debt he was actually proceeding to create debt in the shape of a terminable annuity. Indeed few measures could have so completely demonstrated the futility of the sinking fund policy of the period. Brougham advised Vansittart, if he wanted the money, to take it from the nominal sinking fund which then amounted to over the £17,000,000.[2] Ricardo and Baring condemned the terms of the contract. Shortly afterwards Vansittart had to confess that he had been unable to secure any acceptance of the terms which he had proposed and the scheme was put under the management of Trustees. Eventually the Bank of England was induced to advance a certain portion of the sum required (£13,089,419) in return for an annuity [3] of £585,740.

The scheme was abandoned in 1828 after a severe criticism had been passed upon it by a Select Committee on Public Income and Expenditure.[4] The Committee declared that there was in principle no objection to the policy of creating a terminable annuity as a means of raising money, and that it might be desirable to do so in a particular case in order to meet "a public charge exceeding the ordinary revenue of the country." But the policy had been adopted in 1822 "with a view to creating an addition to the Income of the State, whereby the surplus required to satisfy the Sinking Fund of £5,000,000 might still be provided notwithstanding a considerable reduction of the taxes then existing." The absurdity of this arrangement, which was obvious, could be compared with that of the policy adopted during the war. "The money for the Reduction of Debt was certainly forthcoming . . . but the sale of the annuity was itself a creation of Debt."

---

[1] It was anticipated that the charge would be £2,800,000 per annum in sixteen years' time, and would be extinguished altogether in forty-five years.

[2] Actually £17,219,957 (Great Britain, £16,552,691; Ireland, £667,266). P.I. & E., ii, 254.

[3] Afterwards known as the "Dead Weight Annuity." It expired in 1867.

[4] Fourth Report of the Select Committee on Public Income and Expenditure, 10th July 1828.

The vitality of the sinking fund and the manner in which it survived through subterfuges and manipulations which deceived no one are quite remarkable. It might almost have been regarded as a permanent feature of the financial system. Thus in order to secure a surplus of revenue for debt redemption debt had been created in the shape of a terminable annuity, and in order to meet the charge of the annuity stock held on account of the sinking fund was to be cancelled. While a body of Commissioners was employing money in buying up stock, a body of trustees was attempting to dispose of an annuity for the purpose of supplying the Commissioners with funds.

In 1823 the sinking fund was again remodelled. The policy of maintaining a large nominal sinking fund and of receiving loans from the fund could no longer be tolerated. A Committee of Public Accounts had recommended that the sum appropriated to the reduction of the National Debt "should be limited to the amount really intended to be applied to the discharge of debt and which can be afforded from an annual excess of revenue above the expenditure of the country." Fortunately Vansittart was no longer in charge of the finances of the country; Robinson had become Chancellor of the Exchequer and a new plan could be inaugurated.

By the Act of 1823 existing payments to the sinking fund were to cease, and all stock held by the Commissioners, either on account of the sinking fund or purchased or transferred in exchange for Life Annuities, was to be cancelled.

But the country had not yet got rid of the system. A new sinking fund was to be instituted consisting of £5,000,000 per annum charged on the Consolidated Fund, and no stock placed to the account of the Commissioners was to be cancelled until the annual interest on the debt redeemed should have accumulated to a sum equal to 1 per cent. of the amount of the existing debt, funded and unfunded.

Thus all that was achieved was a reversion to the principles of 1786—a fixed sinking fund accumulating at compound interest with a limit set to the scope of its operation. A small quantity of stock was cancelled by the new arrangement—£25,797,957. But in addition to this £433,342,026 of debt had been wiped out in accordance with Vansittart's plan of 1813 for cancelling stock held by the Commissioners in order to meet the charges of new loans without imposing additional taxation.[1] The total amount of debt redeemed by the fund from 1st August 1786 to 5th April 1823 was £453,152,740.[2] The imposing structure of the original sinking fund was thus demolished, but on its ruins were laid the foundations of a new sinking fund based upon the same principle as that which Pitt had adopted. If the income of the Consolidated Fund did not prove adequate to meet the new charge of £5,000,000 borrowing would occur, and all the evils of a sinking fund maintained out of loans would again be experienced.

The fund had been saved for the time by a measure of simplification. But it could not permanently survive under attacks which were directed against it from all sides. Joseph Hume, the member for Aberdeen, not only argued that the country had suffered considerable loss through borrowing for the purpose of maintaining the sinking fund intact during the war, but also condemned any fund based upon the principle of compound interest.

> "No sinking fund, whether applied from surplus revenue or raised by loan, in this or in any other country, had ever paid off so much

---

[1] A small amount of stock had been cancelled on other grounds. Cf. *Parliamentary Papers*, 1890–1, XLVIII, p. 536.

[2] *Parliamentary Papers*, 1890–1, XLVIII, p. 535. This does not include £7,525,286 of stock transferred on account of Life Annuities.

debt as might have been paid off, if the sum had been applied to pay off the principal of the debt yearly and immediately to cancel the interest on the same."[1]

Ricardo[2] criticized the intentions of the government. He had come across a pamphlet, "published under the auspices of the ministers themselves," which suggested that the sinking fund might either be devoted to the reduction of debt or treated as a reserve fund in war. Lowe[3] asserted that "a large sinking fund, or to describe it in the most simple terms, a large surplus revenue applied to the redemption of Stock would be *productive of public injury*." It would produce an unnatural fall in the rate of interest and would thus tend to drive capital abroad. No direct remedy could be found for the evils of the debt, and relief must be sought in the growth of population and of the national income. Lowe would have preferred to see any surplus that might arise devoted to a reduction of taxation rather than to a redemption of stock.

Probably the biggest influence was exerted by a pamphlet on the sinking fund written by Lord Grenville,[4] who confessed that he had been in 1786 a supporter of Pitt's scheme. Grenville's pamphlet represents the high-water mark of the criticism of the period and is clearly too violent to do adequate justice to the policy of debt redemption. His three leading principles could make no claim to originality even at the time at which he wrote. The dependence of every genuine sinking fund on an actual surplus of revenue over expenditure had been persistently maintained by Hamilton. The futility of borrowed sinking funds and the impossibility of deriving any advantage from a sinking fund in time of war were not new theses. When, however, Grenville attempted to apply his principles to the existing financial situation he arrived at conclusions which were almost as paradoxical as those of Price. He returned to the view that the "public debt consists not in capitals, but in annuities," and decided that the main object of financial policy should be a reduction not of the capital of the debt but of the annual charge. Having reached this point he proceeded to the conclusion that very little could be said on behalf of any policy of debt reduction. "Who can forbear to ask himself in what respect it is a more reasonable or more real operation to reduce taxation by taxing, than to pay debt by borrowing?"[1] Redemption of debt was in fact purchased at a corresponding sacrifice on the part of the taxpayer, and "the benefit and the sacrifice have hitherto been of exactly equal value." He did not see any advantage in the application of the principle of compound interest, and had no doubts as to the opinion that would be formed of a system which regulated "the eventful interests of a great community by an unbending arithmetical progression or by the workings of a rule in algebra."[2]

---

[1] Resolutions relative to the National Debt and Sinking Fund, 25th July 1822, *Hansard*, New Series, Vol. VII, pp. 1740–83.

[2] *Hansard*, New Series, Vol. VIII, p. 221. Compare Vol. VI, p. 480.

[3] *Present State of England*, p. 305.

[4] *Essay on the supposed Advantages of a Sinking Fund* (1828).

Grenville was certainly right in insisting that all genuine sinking funds, whether cumulative or not, are ultimately derived from taxation and in dispelling finally the illusion, which Price had created, that the principle of compound interest was of itself sufficient to redeem debt. On the other hand, his distinction between the capital and the debt charge is obviously far too crude to provide an answer to the problems of debt redemption. And from the standpoint of practical policy his emphasis on the annual charge was probably much less sound than Price's emphasis on the capital of the debt. His doctrine that reductions of debt are simple "Exchanges of Equivalents" overlooks entirely the effects on the taxpayers of a remission of taxation. And he seems quite unconcerned with the problem of the distribution of the costs of a war between the present generation and a future generation which may itself be involved in war.

In the same year as that in which Grenville's pamphlet was published there appeared the report of a Select Committee on Public Income and Expenditure dealing with the problems of revenue, expenditure and debt reduction.[3] The Committee estimated that the following surpluses had arisen since the introduction of the new system in 1823:[4]

	£
1823	6,529,916
1824	6,508,088

---

[1] *Essay* (2nd Edit.), p. 37.

[2] *op. cit.*, p. 84.

[3] Fourth Report, 10th July 1828.

[4] *Report*, pp. 8–9.

	£
1825	5,365,997
1826	836,263
1827	1,047,548

This gave a total of £20,287,812, but if the contract with the Bank for the funding of half-pay and pensions, and the advancement and repayment of certain sums for local works were excluded, the true surplus might be calculated at £14,263,601. On the other hand, £27,159,102 had been handed over to the Commissioners for the reduction of debt. Thus the legal sinking fund had only been maintained by borrowing, since a genuine surplus of revenue over expenditure had not been attained to an amount equal to the sums placed to the account of the Commissioners. The Government and Parliament, relying on the buoyancy of the revenue which had been shown in the first two out of the five years, had made still further reductions of taxation, "even under circumstances which led them at the same time to add to the naval and military establishments of the country."

The Committee, after a criticism of the policy of borrowing with one hand and redeeming debt with the other, declared their belief in a genuine sinking fund and in the necessity of maintaining such a fund during peace. But there did not exist at the time a surplus to the amount of the £5,000,000 required by law; and the Committee held that it was desirable to abandon a fixed legal sinking fund and to limit the sum applicable to the redemption of debt to the real surplus of revenue over expenditure. They recommended that a surplus of £3,000,000 should be aimed at, but that if such a surplus was not forthcoming the sum should not be made up by borrowing. All redeemed debt should be cancelled and the system of applying the dividends of redeemed stock to the purchase of further stock should be abandoned. Some assistance towards the reduction of the debt might be derived from a conversion of permanent annuities into temporary annuities.

A temporary Act [1] was passed in the same year repealing the regulation authorizing the issue of £5,000,000 to the Commissioners, and enacting that the sum to be issued to them should be such as with the interest on stock standing in their names should not exceed £3,000,000. Goulburn, the Chancellor of the Exchequer, having explained that he possessed a clear surplus of only £3,088,708, definitely announced that he would not be a party to borrowing in order to maintain the fixed fund of £5,000,000. He expressed the view which he supposed to represent the general feeling of the country, that borrowing to discharge debt was "a measure objectionable in principle, not defensible with reference to reason, and calculated to create delusion, without affording any subtantial advantage." Sir Henry Parnell pointed out that the real reason for abandoning the sinking fund was that otherwise taxes would have to be continued which "will do a great deal more harm than the sinking fund will do good." If fiscal reform could be achieved, however, and the country appeared to be growing more prosperous, he would support a much more vigorous policy of debt redemption. He would not then object to additional taxation of £5,000,000 or £6,000,000 per annum in order to secure adequate sums for a reduction of the National Debt.

---

[1] 9 Geo. IV, c. 90.

In 1829 an entirely new policy was instituted,[1] and the system which had prevailed in one form or another since 1786 was finally abandoned. All stock standing in the names of the Commissioners [2] was to be cancelled and the dividends on such stock were no longer to be paid to them. This regulation applied not only retrospectively but also to any stock that might be redeemed after the passing of the Act. In future, within thirty days of each quarter day, an account was to be made up of the actual income and expenditure during the four preceding quarters, and one quarter of any surplus that might be found to exist was to be applied to the reduction of debt [3] during the following quarter. In this calculation sums paid into the Exchequer on account of the "dead weight" annuity were not to be treated as part of the national revenue.[4]

Henceforward the sinking fund was limited to any surplus which might arise; the whole machinery of the fixed fund had been finally destroyed. Undoubtedly the policy of applying a definite amount to debt redemption in spite of the fact that a genuine surplus to that amount did not exist was in itself highly objectionable. Nevertheless, it might be capable, if properly applied, of maintaining a level of taxation which would otherwise be reduced, and thereby securing some surplus of revenue over expenditure. The new policy contained all the elements of weakness. The claims put forward on behalf of a reduction of taxes, particularly the duties on raw materials under which Great Britain suffered, could not be withstood for any length of time: and the view that such a reduction was more desirable than a redemption of debt had a good deal of justification. But the weakness of the situation lay in the fact that there was no limit to which concessions might not be pushed. As fast as surpluses arose the Chancellor of the day would find that it was difficult to maintain them and to take a firm stand against demands for tax remission. So far was the necessity of securing a surplus from being felt that in the late thirties of the century several budget deficits were incurred. Probably a large part of the difficulty is to be ascribed to a comparison of the proportions which a surplus, say, of £1,000,000 bears to a debt of £800,000,000 on the one hand and to a tax revenue of £40,000,000 on the other. A remission of taxation amounting to one-fortieth of the tax revenue represents a so much larger proportion than a redemption of one-eight-hundredth of the debt as to make the latter seem hardly worth consideration.

---

[1] 10 Geo. IV, c. 27.

[2] Excluding that held on account of Donations and Bequests.

[3] Including the purchase of Exchequer Bills, § 6.

[4] § 2.

The principles of the old sinking fund, after having survived for a considerable time the most weighty criticism, were for the next forty years to be regarded with the most complete distrust. The change introduced in 1829 marked an absolute break with the past. Not only was the cumulative principle abandoned—that had clearly produced such confusion as to make it impossible that it should endure in any form; but even a fixed sinking fund was not to be permitted. Undoubtedly the reaction had gone too far, and to it may be ascribed in part the lack of any serious treatment of the debt problem for nearly half a century. The necessary insistence on the dependence of a genuine sinking fund upon a surplus of revenue over expenditure tended to divert attention from the inadequacy of the assistance which accidental surpluses provide towards redemption. Whatever views may be held as to the desirability of clearing off debt, it must be admitted that little progress will be made towards reduction unless the regular application of sums to debt redemption is secured by adequate legal machinery.

The system which was thus destroyed was complex, and it would be incorrect to speak of the operations of the sinking fund. There had been the original sinking fund of 1786 and the 1 per cent. fund of 1792. These, together with the modifications introduced by Vansittart in 1813, were abandoned in 1823 when the amount of stock redeemed amounted to £453,152,740.[1] There was also the sinking fund of £5,000,000 per annum, established in 1823, which in six years had redeemed £29,159,509. The total amount of stock which thus had been wiped out between 1786 and 1829 amounted to £482,312,249.[2] Finally there was the system which was introduced by Perceval in 1808 whereby life annuities might be granted in exchange for stock transferred to the Commissioners of the National Debt.[3] Under this arrangement £10,918,997 had been transferred up to 1828, for which annuities of £882,178 per annum had been granted.[4]

It was clear that no real advantage had accrued from these sinking funds, when the necessity of borrowing to maintain them was taken into consideration. But in two other directions substantial progress had recently been achieved. The floating debt of the United Kingdom which stood at £62,639,742 in 1817 had been reduced by various funding operations to £27,317,000 in 1830. A considerable reduction in the annual charge had been produced by some big conversions of debt. In 1822 Vansittart converted £149,627,687 of 5 per cents. (out of a total of £152,422,143) into £157,109,217 of 4 per cents. irredeemable for seven years, at an annual saving of interest of £1,197,025. In 1824 Robinson converted £76,248,180 of 4 per cents. at par into a 3½ per cent. stock irredeemable for five years, with an annual saving of £381,242. In both cases sums were secured from the sinking fund to pay off dissentients; in Robinson's conversion the £6,149,245 of stock thus paid off were placed to the account of the National Debt Commissioners. Conversions are often treated as unimportant in comparison with other methods for securing relief from the burden of a debt. But an annual saving of over £1,500,000 can hardly be regarded as unimportant on an annual charge (for interest and annuities) of £28,000,000.

---

[1] Report by Secretary and Comptroller-General of the Proceedings of the Commissioners for the Reduction of the National Debt—*Parliamentary Papers*, 1890–1, XLVIII, p. 546.

[2] *Parliamentary Papers*, 1890–1, XLVIII. The figures given in P.I. & E. are slightly different—stock redeemed £483,183,803.

[3] The system was extended in 1816 to include the Long Annuities.

[4] *Parliamentary Papers*, 1890–1, XLVIII, pp. 725–6.

The absence of any determination to secure a surplus for the redemption of debt meant that in the future reliance would be mainly placed upon this effortless process of reducing the annual charge by converting those stocks which bore a relatively high rate of interest. The condition of the British fiscal system at this time was such as to make the abolition or lowering of duties a much more important aim of financial policy than debt redemption. What was obviously lacking was that element of direct taxation which had been provided by the income tax until 1816. But the income tax was regarded as a war tax, a weapon to be kept in the financial armoury until some emergency should call it forth. Hence, there was no possibility of obtaining assistance from the chief source from which a surplus might have been derived. There might perhaps be some hope of a reduction of expenditure. But the Select Committee of 1828 had reported that a large proportion of the expenditure of £55,744,863 in 1827 was for charges of a fixed nature, and could not be diminished by "any measure of retrenchment that could immediately be adopted." For the time, therefore, the policy to be adopted with regard to the debt could only have the purely negative aim of maintaining budgetary equilibrium and thereby avoiding recourse to fresh borrowing.

CHAPTER X

1830–60

To refrain during a period of prolonged peace from making any serious attempt to reduce the burden of a debt may be taken as a sign of weakness in the financial policy that is being pursued. Although the old system had met with general condemnation, doubts were expressed as to the wisdom of the new method of leaving the redemption of debt to the mercy of accidental surpluses. Baring lamented that "all hopes of a surplus to be applicable to the reduction of the public debt were to be derived from some sanguine expectations of a future though distant improvement of the Revenue." He pointed out that he had not condemned Pitt's sinking fund but only its abuses. Finally, he warned the Government that there were at least 1,374,000 persons interested in the stability of public securities, and that out of 274,823 holdings 250,000 did not receive a half-yearly dividend in excess of £100.

Nevertheless, there were two powerful factors making for a weak treatment of the debt problem. First, the violent prejudice, originally directed against the machinery of Pitt's sinking fund, had developed into an objection to a fixed sinking fund in any form. A fixed fund was too closely associated with the idea of borrowing to pay off debt to become acceptable under the circumstances of the time. Secondly, the claims of fiscal reform quite clearly took precedence over every other claim. Althorp in 1830, having repeated the doctrine that the debt should be regarded not as a capital to be discharged but as a perpetual annuity, declared that "if, as he believed, by repealing taxes, the general wealth of the country would be more increased than the debt would be diminished by their continuance, good policy dictated that the amount of the taxes should be left in the pockets of the people." [1]

---

[1] *Hansard*, New Series, Vol. XXIII, p. 338. Cf. also Parnell, *Financial Reform*, pp. 220–1.

Under these conditions a sinking fund could only be smuggled in under another name. Many authorities had advocated the conversion of perpetual annuities into terminable annuities; [1] and although the policy of converting stock into life annuities had been a cause of loss to the Exchequer —during the years 1808–28—the loss could be explained as a result of the unfavourable terms which had been selected. Sir Henry Parnell had persistently maintained that considerable results would be achieved by the adoption of a scheme of terminable annuities. "By this plan," he argued, "time does that necessarily for the public which, if left to Sinking Fund schemes, might possibly never be done." [2] He had come to the conclusion that from the standpoint of the annual charge terminable annuities were not much more expensive than perpetual annuities. Debt could therefore be easily redeemed with a very small addition to the annual burden.

In 1829 [3] a new system of life annuities was established upon a more reliable actuarial basis. Moreover, the Commissioners of the National Debt were authorized to grant not only life annuities but also annuities for terms of years in exchange for stock or cash,[4] the annuities thus granted being charged on the Consolidated Fund. The stock received was to be cancelled immediately and no dividends were to be paid upon it. The Commissioners appear to have refused to grant annuities which ran for less than ten years; but bankers, dealers on the stock exchange and insurance companies transferred between 1830 and 1840 more than £16,000,000 of stock to them.[5] It has been suggested that such transfers were made in anticipation of a fall in the price of securities and of the possibility of repurchase of stock at a lower level.[6]

In 1833 further steps were taken in the same direction.[7] The National Debt Commissioners were empowered to apply sinking fund monies to the purchase of the reversion of perpetual annuities and to grant in exchange "an Annuity or Annuities to continue for such limited term of Years certain and upon such Terms and Conditions" as should be agreed upon between the Commissioners and the holders of the securities. The annuities granted were to be charged upon the Consolidated Fund and the stock transferred to the Commissioners was to be cancelled.

---

[1] Cf. Ricardo's Speech, 11th March 1823, *Hansard*, New Series, Vol. VIII, p. 538; Select Committee on Income and Expenditure, 1828.

[2] *Financial Reform*, p. 283.

[3] 10 Geo. IV, c. 24.

[4] In the case of Life Annuities in exchange for Long Annuities also.

[5] Cf. *Accounts and Papers*, 1890–1, XLVIII, p. 752.

[6] *Ibid.*

[7] 3 & 4 William IV, c. 24.

The difference between the two methods is obviously a purely technical one. Under the first arrangement the burden would fall upon the Consolidated Fund in the shape of an increased annual debt charge: under the second the burden would fall upon the sinking fund and would be represented by the difference between the capital values of a perpetual annuity and a terminable annuity of equal amounts. It is clear, however, that the Act of 1829 held out more definite hopes of debt redemption than did the Act of 1833. The second Act relied upon the existence of funds in the hands of the Debt Commissioners; the first Act created a sinking fund which had a legal basis and did not depend upon a surplus of revenue over expenditure.

This disguised sinking fund of 1829 was naturally, in proportion to its greater legal security, as liable to abuse as the old sinking fund. If borrowing had to be incurred in order to meet a budget deficit the old policy of creating and repaying debt at the same time would arise in a new form. But a change of name often conceals an essential similarity in the problems that have to be met: and there seems at this period to have been little realization of the dilemma of either applying a fixed sum to debt redemption, perhaps at the cost of borrowing, or relying upon the windfall of chance surpluses. Small attention appears to have been paid to the difficulties which surround the introduction of any extensive scheme of terminable annuities. Parnell, for example, had suggested that a considerable part of the debt could be redeemed by such a method. The disadvantages that this type of security presented to the investing public tended to be overlooked. In the first place, the value of a terminable annuity diminishes continuously, and hence it cannot show those characteristics which are necessary for the creation of an organized market and which appear so clearly in the case of the perpetual redeemable annuity. Secondly, trustees and other persons whose investment is guided by long-period considerations naturally dislike a security the capital of which is being repaid year by year. Thirdly, a tax upon income is charged upon the whole annuity, and therefore falls not only upon the interest but also upon that portion which represents repayment of capital. This last consideration only operated after the reimposition of the income tax by Peel in 1842, but it seems to have been sufficient then to restrict considerably the demand for this type of annuity. From the middle of the century the policy of converting perpetual annuities into terminable annuities became almost entirely limited in its application to stock held by the National Debt Commissioners on behalf of certain Government departments.[1] Since the scheme possessed very little attraction for the outside public the possibility of using it to bring about any important reduction in the debt seems to have been considerably overestimated.

The weakness of the policy of this period was in harmony with the view, based both on economic and on moral grounds, that the debt ought not to be repaid in full. The comparison of currency values at the times at which the various loans had been contracted with the value of the currency during more recent periods still persisted.[2] Furthermore, the stockholder was supposed to have escaped his fair share of public burdens. It was also urged, after the passing of the Reform Bill, that the debt had been contracted by an irresponsible legislature which had squandered the money so raised upon wars waged without any just cause against foreign countries.[3]

On one point, however, there could be no disagreement. It was clearly desirable to take advantage of the fall in the general rate of interest so as to reduce the annual debt charge by the carrying out of conversion operations. In 1830, 1834, 1844 and 1853 conversion schemes were introduced. So far, indeed, had such schemes gone towards superseding other forms of debt policy that McCulloch in 1845 declared that they had achieved far more than sinking funds in the way of reducing the annual charge.[1]

---

[1] *Vide infra*, pp. 177–8.

[2] Cf. Cobbett's letters to Hon. J. Stuart Wortley: Mr. Buckingham's Plan for the Redemption of the National Debt, *Hansard*, Third Series, Vol. XIX, p. 4 *et seq.*

[3] *Hansard*, Third Series, Vol. XIX, p. 9.

In 1830 Goulburn dealt with the 4 per cents. which had been created as a result of Vansittart's conversion of the Navy 5 per cents. in 1822. These 4 per cents. stood on 15th March 1830 at 102½ (ex dividend). The holders were offered, as alternatives to being paid off, either £100 in a 3½ per cent. stock guaranteed against redemption for 10 years or £70 in a 5 per cent. stock guaranteed for 42 years. The conversion was completely successful. Out of £153,671,091 of stock £150,790,176 were converted, £150,119,609 into 3½ per cents., the remainder into £469,398 of 5 per cents. The annual saving produced by the operation was £753,952.

Althorp's conversion in 1834 was much less extensive in scope and much less successful. £10,622,911 of 4 per cent. annuities of 1826 [2] were to be converted at par into 3½ per cent. annuities. Stock in the hands of dissentients amounted to £4,133,121; this was paid off and the stock vested in the National Debt Commissioners. The annual saving amounted to £53,115.

In 1844 another large scale conversion was brought about by Goulburn. This operation was, in fact, the biggest of its kind that had yet been attempted. It dealt with £248,757,311 of stock, represented by

	£
3½ per cents. of 1818	9,514,369
Reduced 3½ per cents.	67,701,606
New 3½ per cents.	157,243,517
Old 3½ per cents. and Debentures . .	14,401,171
Dissentients paid off	103,352

To the holders of these 3½ per cent. stocks Goulburn offered at par a 3¼ per cent. stock for 10 years and a 3 per cent. stock. guaranteed against redemption for the next 20 years, *i.e.* until 1874. The price of the New 3½ per cents. on 1st March 1844 stood at 102¼, Consols standing at 97⅜. The whole of this vast quantity of stock was converted except for £103,352 which was paid off: the annual saving effected by the conversion was £621,893.[1] Goulburn was certainly fortunate in the moment which he chose for the introduction of his conversion: by December 1845 Consols had sunk back to 91⅞.

---

[1] *A Treatise on the Principles and Practical Influence of Taxation and The Funding System*, p. 420.

[2] Representing the funding of Exchequer Bills.

These big conversions had resulted in a clear gain to the Exchequer. They had taken place at par and there was therefore no increase in the capital of the debt to be offset against the reduction in the annual charge.

In 1853, however, Gladstone brought forward a complex scheme, in which an increase in the capital of the debt was definitely involved. Gladstone's proposals were intended to secure two main objects and were adapted to the conditions of two different classes of stockholders. First, the remnants of the various South Sea stocks amounting to about £9,500,000 were to be cleared off. Secondly, an attempt was to be made to get the rate of interest on Government securities still lower and to create a new 2½ per cent. stock.

The holders of the South Sea stocks[2] were offered various terms as alternatives to being paid off:

For every £100 of stock—

(*a*) £82½ of 3½ per cent. stock guaranteed against redemption for forty years.

(*b*) £110 of 2½ per cent. stock guaranteed also for forty years.

(*c*) Exchequer Bonds at par. These Bonds were to bear interest at 2¾ per cent. until 1864 and then 2½ per cent. until 1894, and were to be finally redeemable at par.

On the other hand, voluntary conditions of conversion on the same terms were offered to the holders of the big 3 per cent. securities—the 3 per cent. Consols and the 3 per cent. Reduced.

The attempt to create a new security of a lower denomination than that of any stock which had hitherto been issued was bold and original, and may have had a favourable influence upon subsequent conversions of the 3 per cents.[3] It involved, however, a 10 per cent. increase in the capital of that part of the debt which was converted. Owing to fears that there might be a big demand for this new stock the total amount to be issued was limited to £30,000,000.

---

[1] Until 1854.

[2] Old and New South Sea Annuities; Annuities of 1751; also the Bank Annuities of 1726.

[3] Cf. Buxton, *Finance and Politics*, Vol. I, p. 128, footnote.

The other novel element in the proposals was the creation of a type of debt intermediate between the floating debt as represented by Exchequer Bills and the funded debt as represented by Consols. The Exchequer Bond was an experiment which it was thought would both meet an unsatisfied need for this intermediate form of investment and would also enable the funding of the floating debt to take place on more favourable terms than had hitherto been obtained. The total amount of these Bonds was to be limited to £30,000,000; they might be issued in exchange not only for stock but also for Exchequer Bills.

In the light of the subsequent failure of Gladstone's scheme it was afterwards asserted that a most unfavourable moment had been chosen for its introduction. There had been a drain of bullion from the Bank: the Bank-rate, which stood at 2 per cent. on the 1st January, had risen to 2½ on the 7th and to 3 on the 20th; the prices of Government securities were falling. Nevertheless, so far as the prices of securities were concerned, the outlook at the beginning of 1853 was not unfavourable; Consols had been quoted at 101¼ in December '52, and the prices [1] at the beginning of '53 were as follows:

	£	*s.*	*d.*
1st January	100	13	5
1st February	98	19	4
1st March	99	4	7

A decline in values only set in from May 1853. At the time when the proposals were actually brought forward they appear to have been regarded as too liberal in the terms which they represented.[2] Moreover, Gladstone had been successful in reducing the rate on eight and a half million of Exchequer Bills maturing in March from 1½*d.* a day to 1*d.* a day.[3]

The factor which chiefly marred the success of the scheme was the outbreak of political disturbances in the East. The price of Consols declined and touched £92 13*s*. 1*d*. on the 1st October. The Bank-rate was raised to 5 per cent. on the 29th September.

---

[1] ex dividend.

[2] Cf. Northcote, *Twenty Years of Financial Policy*, p. 227.

[3] *Ibid.*, pp. 231–2.

The failure of the optional portion of the Conversion Scheme could be regarded with some indifference. Holders of Consols and Reduced Threes only surrendered £1,570,468 of stock: £408,900 of Exchequer Bills were exchanged for Exchequer Bonds. But the consequences to the State from the necessity of repaying at par the holders of South Sea securities under the terms proposed were definitely serious. Only £1,493,438 of stock was converted and £8,048,131 had to be paid off at £741,130 more than its market value.

The conversion had created the following amounts of new securities:

3½ per cents.	240,746
2½ per cents.	3,038,962
Exchequer Bonds	418,300

The annual saving resulting from the operation was only £7,258. Against this had to be set the loss involved in redeeming at par the stocks marked out for compulsory conversion. Gladstone could only claim that the money required for paying off the dissentients had been obtained partly out of surplus income, partly out of balances which were unproductive.

The conversions which had been undertaken since the abandonment of the old sinking fund had achieved a good deal in diminishing the debt charge. It was clear, however, that little reliance could be placed upon the new sinking fund which was to be fed from budget surpluses. In many years there had been budget deficits and on the whole the sums devoted to redemption, though not negligible, could not be regarded as having contributed to any serious reduction of the debt. From 1830 until 1853 the following sums were devoted to debt reduction under the regulations of 1829:

	£		£
1830	1,930,158	1835	1,263,366
1831	2,668,366	1836	1,583,788
1833	1,017,807	1837	1,978,663
1834	1,770,102	1844	1,554,338

	£		£
1845	4,134,484	1850	2,321,708
1846	3,568,753	1851	3,000,232
1847	1,848,290	1852	2,406,962
1849	10,349	1853	2,587,817

A series of budget deficits had marked the end of the thirties, and the financial situation had only been saved by the reimposition of the income tax in 1842. But the income tax was to be used rather as an instrument of commercial reform than as a means towards securing budget surpluses which would be devoted to reduction of debt. And the condition of the tariff undoubtedly justified the emphasis which was placed upon the need for an efficient system of direct taxation as a substitute for the mass of unproductive and ill-devised duties upon commodities.

Moreover, the realization of a surplus is not regarded as an element of sound financial policy. The duty of the Chancellor of the Exchequer is to " balance the Budget." Clearly it is unsound to incur a deficit : but a surplus also, though hardly deserving severe criticism, is not a thing to be aimed at, and if it is large the Chancellor is bound to be attacked. The argument has usually been that it is better to " let the money remain in the pockets of the people." [1] But if a country relies for the reduction of its public debt upon such accidental surpluses what is to become of the doctrine of balancing the Budget ? Are we forced to admit that that doctrine has only a one-sided application, and that it is a purely ordinary instruction that no deficit must be incurred ? May the Chancellor under such circumstances aim at a surplus, and if so what should be the size of that surplus ? These questions have hardly ever been faced, and financial policy has tended to take the weaker line of giving away surpluses in the shape of remissions of taxation. The Finance Committee of 1828 recommended that a clear surplus of not less than £3,000,000 per annum should be aimed at ; but its recommendation never received any concrete application. The nature of the tax system of Great Britain round about 1840 was probably such as to make it desirable that many duties should be remitted.

---

[1] Cf. Ricardo's Speech in 1821 : *Hansard*, New Series, Vol. V, p. 1095.

But the danger of the popular attitude to the problem lay in the fact that the policy would be continued long after fiscal reform had achieved its principal objects and throughout a period when the country could well afford to make some attack upon the debt. "Letting the money remain in the pockets of the people" is an attractive maxim, particularly to the taxpayer, and it requires courage to gainsay it. But it is obviously liable to a good deal of misapprehension and cannot be accepted without qualification. Misapprehension arises because the maxim suggests that when a surplus is secured the money is withdrawn from the community and is in some way rendered completely useless. The fact that the money returns into the pockets of the holders of Government securities by whom the greater part of it is usually reinvested tends to be overlooked. Again, the maxim may have a good deal of value in a situation where definite provision, in the form of a fixed sinking fund, is made for redemption of debt. But it cannot be accepted without qualification in circumstances, similar to those in which Great Britain found herself in the middle of the last century, where no such definite provision has been made. The rival merits of tax remission and debt reduction have to be weighed carefully. At times the balance may be quite clearly in favour of tax remission, as for example in the forties. At other times the balance may be equally clearly in favour of debt reduction. But even at such times it would not be prudent to concentrate solely on one objective. It is rather a question of the correct proportions to be observed between one financial objective and another. If the whole emphasis is placed upon tax remission, as tends to be the case, debt policy cannot help being weak and ineffective.

J. S. Mill in his *Principles* criticized the maxim that money should be left to fructify in the pockets of the people, but recognized certain qualifications to the doctrine of securing a surplus. It was better to get rid of harmful and ill-devised taxes than to maintain them in order to secure a surplus for redemption. Mill rejected the proposal for a general contribution from property for the purpose of repayment, on the ground that some payment was due from other factors besides property. Nevertheless, he regarded succession duties as an especially suitable instrument for securing the redemption of debt.

McCulloch, in his *Treatise on the Principles and Practical Influence of Taxation and the Funding System*, tended to take the view, which was becoming increasingly fashionable, that the lightening of the burden of the debt should be sought in the development of the productive capacities of the country and in the growth of its wealth. He declared that "the stupendous inventions and discoveries of Watt, Arkwright, Crompton, Wedgwood and others, have hitherto falsified all the predictions of those who anticipated national ruin and bankruptcy from the rapid increase of the public debt." [1] And he held that the best way of dealing with the debt was not to attempt to pay it off, but to adopt "such measures as may seem best fitted to give additional vigour to the productive energies of the people." [2]

This point of view has gained general recognition. It is now fully understood that a debt which was extremely burdensome to the generation which lived immediately after the close of the Napoleonic Wars became capable of being borne with ease in the latter half of the last century, largely on account of the great increase in aggregate wealth which had taken place. There had, of course, been a great increase not only in aggregate, but also in *per capita* wealth. But if *per capita* wealth is taken as the basis of calculation it must be compared with the *per capita* debt charge. Clearly McCulloch's view ignores one factor which contributed to a lightening of the debt charge, namely, the growth of population. The burden of the debt came to be borne more easily not only because of the growth of *per capita* wealth, but also because it was spread over a larger number of people. Dudley Baxter, in his pamphlet on *National Debts*, published in 1871, actually placed the chief emphasis upon this factor. He declared that "of all the causes of the diminution of the burden of the Debt, repayment of Capital by exertions of the nation has been much the least important; diminution of the rate of interest stands next in order; increase of wealth beyond the increase of population has been still more powerful; and the increase of population has been the most effective of all." [3]

[1] p. 411. [2] *Ibid.*, p. 465. [3] *National Debts*, pp. 22–3.

The view that a diminution of the burden of the debt should be sought in an increase in productive capacity naturally tended to weaken any incentive which might exist to reduce the debt by the heroic policy of securing a surplus of revenue over expenditure. It rested ultimately upon the optimistic conclusion that, although the present generation could stand the burden more easily than its parents, its children would be still more capable of standing it. It was without any anxiety for the future, such as might have prompted the thought that advantage should be taken of the current prosperity to reduce a charge which might prove intolerable to a less favourably situated generation.

War definitely pointed the limits to the adoption of this cheerful doctrine. A country that could envisage an unbroken period of peace during the remainder of its history might be content to leave a public debt alone. Plainly, however, the financial policy of Great Britain should have been influenced by considerations of the possibility of a disturbance of peace. Whatever views might be expressed about the necessity of meeting the costs of a war out of taxation and about the use of the weapon of the income tax in such an emergency, it was highly improbable that the country could escape from any prolonged disturbance without a considerable addition to its debt.

Prior even to the outbreak of the Crimean War in 1854 there had been three occasions since 1830 on which large sums had had to be borrowed for emergency purposes. In 1835 and 1836 the payment of compensation to the Slave Owners of the West Indies involved the raising of loans to the extent of £20,154,320, and an addition to the debt charge of £732,882.[1] At a later period the necessity of making provision for the relief of distress in Ireland and in the West Indies led to the negotiation of a loan of £8,000,000 in 1847 and a loan of £2,000,000 in 1848 with a total addition to the debt charge of £336,810.

The war with Russia appeared likely to involve the country in a considerable financial outlay. Gladstone, in his famous

---

[1] *viz.* a loan of £15,000,000 in 3 per cents. at par and a long annuity of £101,875 expiring in 1860; two other loans aggregating £5,154,320 in 3 per cents. at a slight premium.

Budget speech of 1854,[1] declared that it was his intention to proceed as far as possible without recourse to loans. In rather unmeasured language he denounced the whole policy of borrowing. "The system of raising funds necessary for wars by loans . . . practises wholesale systematic continued deception upon the people." It was desirable that the nation should know the price which had to be paid for the benefits that were supposed to be derived from war. "The expenses of war are the moral check which it has pleased the Almighty to impose upon the ambition and the lust of conquest that are inherent in so many nations." Gladstone made it plain that he proposed to meet the situation by an increase in the income tax. This tax he had hitherto regarded not as a permanent element in the fiscal system, but as a powerful weapon to be reserved for periods of financial stress. In 1853 he had in fact put forward an arrangement by which the tax was to sink gradually from its existing level of 7*d.* in the pound until it should finally expire in 1860. But war had altered all this. "You have," he declared, with reference to the income tax, "a mighty engine to an extent equal to a great part of what any war can demand." He proposed, in fact, to double the tax for the first half of the financial year. To reinforce his arguments about the impropriety, both on moral and on economic grounds, of borrowing he proceeded to draw comparisons with the financial position of other countries. The United States could afford to raise loans, knowing that these loans would shortly be repaid out of surplus income. France was much less in debt than Great Britain. No country could be found "which has played so deeply at this dangerous game as England has done—there is no country which has mortgaged the industry of future generations to so fearful an amount."

The small amount of borrowing that actually was required took place in Exchequer Bonds. These Bonds were issued in three series of £2,000,000 each, repayable in 1857, 1858 and 1859.[2] The policy of borrowing on such Bonds Gladstone regarded as entirely free from the objections which might be urged against the policy of borrowing on perpetual annuities, particularly if the Bonds were issued in anticipation of taxes.

---

[1] 6th March 1854.

[2] These bonds were not repaid but were renewed. According to Northcote, few tenders were made for them and the Treasury had to publish the reserved price for their issue. *Twenty Years of Financial Policy*, p. 254, footnote.

When Sir George Cornewall Lewis became Chancellor in 1855 he showed that, while he was prepared to maintain taxation at a high level during the war,[1] he did not share Gladstone's views about borrowing. He believed that "taxes which cripple enterprise and derange industry, or interfere with the ordinary distribution of capital, are more detrimental to the community than loans effected by the Government."[2] He maintained that the question was not whether the country should rely entirely on the proceeds of taxation for the purpose of financing the costs of the war, but what proportions should be observed as between taxes and loans. Newmarch's pamphlet on Pitt's loans had thrown some doubt on Gladstone's somewhat confident assertion that if an efficient system of direct taxation had been adopted at the beginning of the Napoleonic Wars the war debt could have been avoided.

A loan of £15,000,000 was negotiated, the terms being, for £100 in cash subscribed £100 in 3 per cent. Consols and an annuity of 14*s.* 6*d.* for thirty years. The problem of the repayment of this war debt could not be easily solved. To negotiate a loan in Consols and to make no provision for its repayment might be represented as a policy of weakness. But it was difficult to suggest any alternative. When loans were negotiated on terminable annuities repayment was certainly automatically secured, but it was generally recognized that the terminable annuity was a security with a very limited market. Again, if stock were issued redeemable after a certain term of years it was fairly certain that Parliament would renew the debt when the period had elapsed. On the other hand, the experience of the Napoleonic Wars had revealed the illusory nature of a sinking fund maintained in spite of an excess of expenditure over revenue. The memory of the old sinking fund was still too strong for it to be possible for a Chancellor to smuggle into his financial arrangements some system of debt repayment which was not based on a genuine surplus. Lewis fell back on the rather lame proposal that Parliament should guarantee the institution after the conclusion of peace of a sinking fund of £1,000,000 per annum on the war debt. He recognized as clearly as anyone the inability of Parliament to bind its successors, but he found it impossible to propose any practicable alternative.

---

[1] The income tax was raised to 1*s.* 4*d.*

[2] Budget Speech, 20th April 1855.

In February 1856 another loan to the extent of £5,000,000 was negotiated.[1] The terms of the loan were £111 2*s*. 2*d*. in the 3 per cents. for £100 cash. Finally, in May 1856 a further sum of £5,000,000 was borrowed,[2] the terms being £107 10*s*. 7*d*. in the 3 per cents. for £100 cash.[3]

The war came to a close in 1856; in the following year the Chancellor undertook a review of the financial situation. The net addition to the debt he calculated at £32,361,078: the total increase in the annual charge at £1,460,000. Considerable obligations had also been incurred with regard to the repayment of debt. Thus in each of the years 1857, 1858, 1859, £2,000,000 of Exchequer Bonds fell due to be repaid, and in the year 1860 £1,000,000. The sinking fund for the war loans, which was taken at £250,000 for 1857, would amount to £1,500,000 for the years following, until the entire debt was discharged. Lewis therefore proposed that the income tax should not be lowered in accordance with Gladstone's arrangement of 1853, but should remain at 7*d*. in the pound up to and including 1859.

Both Gladstone and Disraeli criticized Lewis's proposals; and when Disraeli became Chancellor in 1858 he showed clearly the small consideration which he paid to questions of debt repayment. He began by taking the income tax at the figure to which it would have fallen in accordance with Gladstone's plan—5*d*. in the pound. It could then be proved that debt repayment could not be carried out unless taxation were *increased*. But while Gladstone's plan might be regarded as resting upon a sacred compact between the State and the taxpayer, there was nothing inviolable about the arrangements which had been made for the repayment of debt. The Exchequer Bonds which fell due that year were accordingly renewed ; the war sinking fund proposed by Lewis completely disappeared.

---

[1] The only tender was made by the firm of Rothschild. Their offer of £100 for £112 5*s*. of stock was rejected and the Treasury's minimum price of £111 2*s*. 2*d*. was finally accepted. Cf. Northcote, *op. cit.*, p. 279.

[2] The contract was again secured by the firm of Rothschild at the minimum price; Northcote, p. 288.

[3] Additional sinking funds of £250,000 on each of these loans were to be established on the termination of the war.

This policy probably represented a more complete indifference to the question of the repayment of the debt than had yet been experienced. Hitherto on the termination of a war strong opinions had usually been expressed as to the necessity of making some provision for debt redemption After the War of Independence Pitt's sinking fund had been established. After the Napoleonic Wars, in spite of the heavy weight of taxation, an attempt was made to secure a genuine sinking fund, and the need for reducing the debt was seriously felt. In 1858, however, there appears to have been scarcely any recognition of the desirability of maintaining the sinking fund which had been specially created for the purpose of extinguishing the war debt. Gladstone's arrangement of 1853 for the gradual reduction and abolition of the income tax, which had been admittedly introduced without any reference to the possibility of the outbreak of a war, was regarded as inviolable in spite of the fact that the financing of the Crimean War had brought about a definite breach of its terms. Lewis's arrangements for the repayment of the war debt, on the other hand, were not supposed to be binding upon his successors.

Some excuse might have been found for the neglect to continue existing provisions for the redemption of the war debt if it could have been shown that the nation could not afford to maintain these provisions. But it is obvious that it would have been impossible to put forward a defence of this sort. On the contrary, there had been a general increase in wealth, and the nation was sufficiently prosperous to have been able to maintain without much difficulty the sinking fund which had been originally proposed.[1]

The hollowness of the argument that the arrangement of 1853 must be scrupulously observed was revealed fairly clearly in 1859 and 1860 when the income tax was raised, first to 9*d.* and then to 10*d.* Nevertheless it was not raised in order that a surplus might be secured for the redemption of debt. The aim of debt redemption could never at this period have been regarded as a sufficient justification for the retention of the tax. The necessity for its continued existence lay in the final consummation of the reform of the fiscal system.

---

[1] Disraeli, however, defended his policy in his Budget Speech of 1867 on the ground that "to inflict on the country new taxes at the moment when, like the present, there was considerable monetary disturbance and pressure—and that to the amount of £1,500,000—for the purpose of paying off debt would be to involve ourselves in a ruinous and really silly proceeding."

Another sign of the prevailing attitude towards the problem of the debt appeared in 1860. Gladstone was again Chancellor, and it might have been expected that his violent denunciation of the policy of borrowing would have had its counterpart in a vigorous attempt to reduce the existing volume of debt. If it was unjustifiable to borrow even for the purpose of financing a war, it was surely right in a period of peace to make some provision for the repayment of loans which had been contracted during past wars.

No such provision was, in fact, made: thus £1,000,000 of Exchequer Bonds which were to have been paid off this year were allowed to be renewed. But this was not the only element of weakness in the financial policy of 1860. The long annuities which since 1760 had been attached to various loans had been so arranged as to expire in 1860. They amounted to £1,295,421.[1] As things stood there would be a clear gain from a corresponding diminution of expenditure, which would be experienced from 1860 onwards. But since the expiration of these annuities represented the extinction of a certain quantity of debt, it would have been in accordance with sound financial policy not to assume the whole advantage to be derived from their expiration but to replace at any rate some portion of them. In short, it might have been supposed that a fresh set of terminable annuities would have been created. Gladstone, however, showed no intention of making any arrangement of this sort, and the annuities were allowed to lapse without replacement.

A strange combination of factors had led during the period 1830–60 to an almost complete neglect of the question of the redemption of the debt. For a considerable part of that period some influence in this direction can be ascribed to the needs of fiscal reform. But as that reform came to be achieved other considerations proved equally powerful in producing an attitude of indifference towards the problem. On the one hand, an actual reduction of debt had taken place since the close of the Napoleonic Wars. Lewis could point out even at the close of the Crimean War that, whereas in 1816 the nominal capital of the debt (funded and unfunded) had amounted to £860,251,647, by 1856 it had sunk to £793,392,799. On the other hand, the growth of wealth had produced a feeling of confidence. It was generally realized that with this growth of wealth the burden had become less and less felt ; and it was held that with the same rate of growth in the future posterity would easily be able to make those provisions for redemption which the existing generation had been unwilling to secure. Thus no serious attention was paid to the question of the repayment of the debt until an alarm had arisen concerning the exhaustion of the natural resources of the country.

---

[1] The total amount which would expire in 1860, including some smaller annuities, was £2,040,000.

CHAPTER XI

TERMINABLE ANNUITIES

The change which occurred in the attitude of both Parliament and the nation to the debt after 1860 cannot be attributed to a single cause. The publication of Jevons's *Coal Question* in 1865 admittedly exerted some influence; Gladstone devoted a large portion of his Budget speech of 1866 to an argument concerning the relation between the exhaustion of the mineral resources of the country and the necessity for the discharge of the debt. But this consideration was only one of those which led to a more vigorous treatment of the debt. In the first place, the aims of fiscal reform had been almost entirely achieved. The Budget of 1860 and the commercial treaty with France appeared to have brought to a conclusion the work on which the greater part of the financial efforts of the previous quarter of a century had been concentrated. Gladstone himself declared that "when you have advanced a certain point in the reformation of your fiscal system, the balance of consideration begins to change, and a greater urgency begins to come into view for the repayment of debt with a diminished urgency for the remission of taxes or for maintaining an equal dispatch in that remission."[1] Secondly, it was difficult to view with satisfaction the provision existing for the redemption of debt. The long annuities had been allowed to lapse in 1860 without any suggestion that the gap would be filled by further arrangements for the extinction of the debt. In 1867 the dead-weight annuity[2] amounting to £585,740 would expire. It appeared indefensible that a country which was experiencing a great increase of wealth should allow the discharge of its debt to depend mainly upon accidental surpluses of revenue over expenditure.

Nevertheless the difficulties in the way of inaugurating a new policy were considerable. The necessity for some attack upon the debt was not universally felt. The demand for a reduction of taxation still persisted. It was urged that "when the country was in a state to pay off debt they were in a position to exonerate the country from so much taxation."[1] On the other hand, the old argument concerning the growth of the national wealth was repeated. The debt charge had remained the same, while the wealth of the country had doubled; accordingly the burden of the debt was only half what it had been a generation ago. This was due to the fact that money had not been devoted to the repayment of debt but had been invested in industry. Would it not be foolish to withdraw from productive investment money yielding six, eight or ten per cent. in order to discharge debt on which the return was only three per cent.? The superficial plausibility of these arguments made it difficult for the Chancellor of the day to convince the nation that some systematic plan of redemption ought to be pursued. It was, however, pointed out that it was falsely assumed that "when money has been paid back to the public creditor it ceases to exist for any practical purpose."[2] Moreover, the argument about the growth of wealth during the previous half-century ignored the question at issue. If it were true that the industrial supremacy of Great Britain were in danger of being lost, the problem of the debt ought to receive close attention. Gladstone argued that if the advantage in the cheap production of coal should go to America, there would be a migration of British labour and capital, and the result would be that fixed property within the country would have to bear a much heavier burden on account of the debt charge than it had formerly done.

---

[1] Speech on Terminable Annuities Bill, 24th May 1866.

[2] *Vide supra*, p. 147.

But even if the desirability of making more adequate provision for the redemption of the debt were admitted, there still remained considerable room for dispute as to the means by which the end should be achieved. The idea of a sinking fund was still viewed with suspicion and mistrust on account of the policy which had been adopted during the Napoleonic Wars. It was perfectly possible at this time to define a sinking fund as a fictitious arrangement by which money was borrowed in order to pay off debt.[1] Grenville's pamphlet of 1828 was freely quoted in the Commons, and it seemed highly improbable that the country would ever again be induced to accept a system which involved the cumulative redemption of debt. The policy of applying accidental surpluses to the repayment of debt appeared to be the only method on which it would be safe to rely.

---

[1] Hubbard's Speech, 24th May 1866.

[2] Gladstone's Speech, 24th May 1866.

It was impossible, however, to deny that this policy had achieved very little. Gladstone indeed asserted in 1866 that "by the favour of Providence these surpluses have come to us more liberally of late"; but even Providence would be helpless before a Chancellor who carried out a systematic plan of tax reduction and remission. Thus the establishment of a fixed sinking fund and the use of accidental surpluses seemed alike open to objection. Could an alternative be found?

The policy of converting the stock of perpetual annuities into life annuities or terminable annuities was already familiar. To this policy Gladstone now turned, since it seemed to offer the most appropriate means of restoring that provision for the debt which had been allowed to lapse in 1860. There were, however, certain well-known objections to the terminable annuity which might oppose insuperable difficulties to its use on an extensive scale in the financial system. To a large number of investors it was highly inconvenient to hold a security on which a portion of the capital was repaid year by year. Moreover, since the reimposition of the income tax there was the added disadvantage that the tax fell upon the whole annuity and was therefore levied upon the capital as well as upon the income. Gladstone declared that if he went into the open market he would find no purchasers for terminable annuities. It seemed, therefore, improbable that a large amount of debt could be discharged by a policy of this sort.

It was, however, possible for the Government to avoid the necessity of dealing in the open market. Gladstone pointed out that the State possessed a dual character, since it was both debtor and creditor. In its character as debtor it had to meet punctually the interest due on the various stocks. In its character as creditor it held the funds of the Trustee and Post Office Savings Banks invested in its own securities.[1] Nothing appeared to be simpler than to provide that the stock held by the National Debt Commissioners on behalf of the Savings Banks should be converted into terminable annuities. It was even doubtful whether an Act of Parliament would be required to sanction an arrangement made by the State in its capacity as debtor with the State in its capacity as creditor.

---

[1] Cf. W. L. Sargant, *An Apology for Sinking Funds* (1868), p. 28: "To pronounce any financial scheme to be a sinking fund is to say that it is worse than utopian; that it is something like a swindle on the public."

In 1863 the new policy was instituted. Five millions of stock held for the Trustee Savings Bank Fund were converted into a terminable annuity of £315,017 which was to cease in 1885. The increase in the annual charge on account of this operation was £165,017.

By 1866 there was a widespread feeling that something further should be done towards the discharge of the debt. Comparison with recent periods suggested that existing provision for this purpose was quite inadequate. The annual charge for terminable annuities had during the last eight years been represented by the following figures:[2]

	£
1858	2,340,000
1860	300,000
1865	780,000

Moreover, in 1867 a large saving would be secured by the expiration of the dead-weight annuity amounting to £585,740.

Still wider questions had been raised by the problem of the British coal supplies. It is improbable that the very temporary alarm concerning their exhaustion can have played any considerable part in the determination of the policy that was pursued in regard to the debt. But it served to reinforce more purely financial considerations and provided Gladstone with an argument from which he could draw unfavourable comparisons with other countries.

---

[1] The holding of the funds of Trustee Savings Banks by the National Debt Commissioners dated from 1817: the Post Office Savings Banks originated in 1861.

[2] Cf. Buxton, *Finance and Politics*, Vol. II, p. 23. These sums do not include the "dead-weight" annuity.

In his Budget speech of 1866[1] Gladstone reviewed the achievements of the previous fifty years. Since the close of the Napoleonic Wars £180,000,000 had been applied to the redemption of debt, and a net reduction of £100,000,000 had been effected. During the years 1815–54, a period "of the most profound tranquillity ever known to this country," debt had been reduced at the rate of £2,609,000 per annum, "undoubtedly a very trivial sum when we consider the enormous amount of what remains to be achieved." Between 1854 and 1857 the debt had increased at the rate of £10,000,000 per annum, while from 1857 to 1866 there had been a decrease at the rate of £3,646,000 per annum. On the other hand, it had to be remembered that if the country should "become involved in any great and protracted war we must expect, not immediately, but after a year or two of war to see the debt grow at about ten times the annual rate by which we reduce it in time of peace." Comparisons with other countries were not reassuring. The debt of the United States had grown during the Civil War to the amount of 3,000,000,000 dollars, and the charge of the debt must be considerably heavier than the debt charge of Great Britain. But Gladstone did not believe that "that debt need constitute any difficulty for the American people." In Europe the largest debt was that of France; but it only amounted to £400,000,000 or half the total of the British debt. Moreover, Great Britain had been able to bear the burden through her industrial supremacy, but this supremacy would be threatened if she could no longer produce coal as cheaply as other nations.

Gladstone divided his measure into two parts. By operation "A" a debt of £24,000,000 held by the Commissioners on Trustee Savings Bank account[2] was to be converted into an annuity terminating in 1885. The original charge of £720,000 would thereby be increased to £1,725,000. So much of the annuity as would not be required to meet the demands of savings banks depositors would be reinvested from year to year. By operation "B" stocks thus purchased would be converted into a further terminable annuity.

---

[1] 3rd May 1866.

[2] In 1863 £24,000,000 of stock held by the Commissioners for the Trustee Savings Banks were cancelled, and a book debt of £24,000,000 charged upon the Consolidated Fund with interest at 3 per cent. was substituted.

Parturiunt montes, nascetur ridiculus mus. If the expiration of the dead-weight annuity be taken into account the additional sum to be devoted to redemption was less than half a million.[1] Gladstone himself felt that some apology had to be offered for the inadequacy of his proposals. He declared that this was not the only measure that could be employed for the reduction of the debt; but they would not be justified under existing circumstances in proceeding any further. He admitted that his policy did not represent any "marked advance." "It was an attempt to recur to something like the scale of operations for the reduction of our debt by means of Terminable Annuities, which scale had been uniformly maintained for a considerable period until about five years ago."

Nevertheless even this half-hearted measure aroused opposition. It was argued that "as long as we continued to maintain the ratio between the resources of the country and the amount of the annuity as high as formerly we satisfied our obligation to our creditors." Since the termination of the Napoleonic Wars "we had reduced the debt by £6,000,000 a year of annuity, or in other words had reduced the amount of our National Debt by one-fifth or 20 per cent. In the same period the commerce of the country had increased more than five-fold."[2]

The arguments about the exhaustion of the mineral resources of the country were held to need a good deal of qualification. If the consumption of coal increased in geometrical ratio might it not be supposed that the wealth of the country would also increase in that ratio? On the other hand, if the alarm had any foundation, might it not be better to reduce taxation so that accumulation of wealth might take place while the coal supplies lasted rather than "impede the springs of industry by retaining taxes to pay off the national debt"?

The demand for the reduction of taxation was still keenly felt. It was clearly realized that the question must be faced: "Is it worth while for the purpose of reducing the National

---

[1] Fawcett described it as "an insignificant scheme." Gladstone, however, was anxious to point out that he did not claim the credit of "attempting or effecting a great operation."

[2] Speech of Laing, 24th May 1866.

Debt to levy an extra penny or twopence of income tax ?" There is probably no generation that is prepared to admit that it is lightly taxed. The argument that the country had been freed through the policy of commercial reform from injurious forms of taxation made no impression upon those who believed that many duties were still far too high and that the income tax was a thoroughly objectionable imposition.

Criticism was also directed against the system of terminable annuities. To the claim that it secured a regular method of redemption outside the interference of Parliament the objection was raised that the measure tied the hands of Parliament for eighteen or nineteen years. It is indeed worth observing that neither Gladstone nor his critics seriously contemplated the violation of the system which actually occurred in 1885 when payment of the capital portion of certain terminable annuities created in 1883 was suspended. In this possibility of violation lay the really serious objection to Gladstone's discovery that as he was both borrower and banker he could dispose of his terminable annuities without going into the market. Gladstone had claimed the combination of two functions, " by limiting the conversion simply to stocks which form part of the assets held by the State itself as a banker, by paying the dividends to the banking account, and by adjusting through that banking account the wants of the State in years of surplus or years of deficit."[1] He forgot that it would be easy for the State to undo contracts which it had made with itself.

It was clear that the distinction which had been drawn between a fixed sinking fund and terminable annuities was quite unreal. The fixed sinking fund had come to be associated with the policy of simultaneous borrowing and repayment. But if loans were raised in years in which terminable annuities were in operation the same policy would in fact be carried out. Nevertheless, there appears to have been as yet little appreciation of the fact that this danger is incurred in any arrangement for the regular redemption of debt,[2] and can only be avoided if the sinking fund is limited to realized surpluses. On the other hand, there was in the particular scheme introduced by Gladstone no safeguard against the misappropriation of the sums to be applied to the discharge of debt. The payment of the capital portion of the terminable annuity could be suspended. Hence the idea that a system had been introduced which was more secure against violation than a sinking fund was a complete illusion.

---

[1] Speech on Terminable Annuities Bill, 24th May 1866.

[2] The difficulty seems only partly to be met by Gladstone's argument that the State would probably have a surplus on its banking account when it had a deficit on its Exchequer account.

On the fall of the Government Gladstone's measure was taken over by Disraeli. But the scheme was to be limited to operation "A," and the idea of converting further stock which the National Debt Commissioners might purchase out of the annuity paid to them was abandoned.

The terminable annuity had now become a fetish and was treated with the same sort of superstitious reverence which had been paid to Pitt's sinking fund. Disraeli declared his decided preference for the terminable annuity over the sinking fund. He was convinced that whenever a strain came "such a fund would infallibly cease to operate."[1] He believed that he had been entirely justified in abandoning in 1858 the plan introduced by Lewis, and he thought "that was the last effort which will ever be made to establish a Sinking Fund upon the old principle."[2]

It is doubtful, however, whether much was expected from the new policy. Gladstone in 1866 declared that the State held nearly £45,000,000 invested on account of the different savings banks. Of this amount £10,000,000 had already been dealt with:

	Stock converted	Terminable Annuity created			Date of Expiry
	£	£	*s.*	*d.*	
1863 . .	5,000,000 (Trustee Savings Banks Fund)	315,017	0	0	1885
1867 . .	2,500,000 (P.O. Savings Banks Fund)	163,414	7	0	1885
1867 . .	2,500,000 (Trustee Savings Banks Fund)	171,544	0	0	1885

Nevertheless it was reasonable to assume that the deposits of savings banks would grow and that further operations might be undertaken, and it would not have been foolish to have supposed that a fairly extensive reduction of debt could be achieved by the policy of converting stock into terminable annuities.

---

[1] Budget Speech, 4th April 1867.

[2] *Ibid.*

However inadequate these measures may have been the discussion which was aroused had the useful result of focussing attention on the debt. There had at last developed a realization of the fact that the increase of wealth, while creating apathy as to the necessity of redemption of debt, actually indicated that a more energetic policy should be pursued. Giffen argued [1] that existing schemes and proposals for redemption were on far too small a scale, and that a revenue of £220,000,000 could be raised without affecting the prosperity of the country. There had been considerable progress in wealth; the rapid growth of the revenue showed the ease with which the debt might be attacked. A growth of expenditure might be anticipated, but this should be met by fresh taxation. The possibility of the outbreak of war only added strength to the argument that a vigorous measure of redemption should be established.

Meanwhile there were signs of a revival of the doctrine of a cumulative sinking fund. W. L. Sargant in *An Apology for Sinking Funds* maintained that the chief evil of the debt lay in the necessity of having to pay the capital many times over in the shape of interest and declared that the attack on the cumulative sinking fund had gone too far. He was in favour of a fund increasing at compound interest, and he pointed out that in order to derive the greatest advantage from such a fund it should be instituted as soon as possible.[2] Sargant thought it possible that the National Debt Commissioners might invest their funds in fixed interest securities, and thereby earn higher rates than were obtainable on Government stock. A fund of £30,000,000 established on these lines would pay off the whole debt in a hundred years. The income of the fund, which at the outset would amount to £1,000,000, would be entirely provided by the income tax.

Other proposals put forward at this period made use of the same principle.[1] Moreover, in the terminable annuity itself the operation of compound interest was involved. Clearly any efficient system for the redemption of debt must be based on the method of adding the interest of debt discharged to the purchase of further debt. Financial policy is then governed by an arrangement which, though no more inviolable than any other, achieves its object more rapidly. Both the use of accidental surpluses and the adoption of a fixed non-cumulative fund are far too slow in their operation to bring about any considerable reduction of debt in a period which affords any hope that such reduction will be consistently pursued.

---

[1] *Essays in Finance* (First Series), XI. The Reduction of the National Debt (1867).

[2] It should also be formed of such savings from expenditure as would not otherwise be used as capital.

Current discussion of these questions paved the way for a reversion to the principles of the old sinking fund, though the form in which they were now adopted was much less objectionable than that which had prevailed from 1786 to 1829. One of the chief disadvantages of Pitt's fund had been the lack of simplicity in its arrangements. A regular policy of debt reduction requires the support of public opinion, which can in general only be secured if the policy is understood. Pitt's scheme was maintained by the influence of a superstition. The procedure whereby debt was redeemed but not discharged was no doubt to many people a complete mystery. But the mystery had been revealed and the deception could not be again practised. A cumulative sinking fund could only be successfully revived if the machinery of 1786 were scrapped and debt were cancelled as soon as it had been redeemed.

The most important operations on the debt during the last hundred and fifty years have been carried out by Tory Chancellors of the Exchequer.[2] In 1875 Stafford Northcote, Chancellor in Disraeli's ministry, introduced proposals for a new sinking fund.[3] Northcote was clearly not actuated by the feelings which had moved Pitt and his contemporaries. "I am," he said, "no enthusiast on the subject. I do not take either the extreme view of those who think that everything ought to be sacrificed to the diminution of the Debt, nor of those who represent it as merely a question of buying Consols at 92." Comparisons, however, suggested that the efforts which the country was making in this direction were inadequate. There had been a decrease since 1859 of 5 per cent. in the contribution made to the reduction of the debt, but there had been an increase during the same period of 65 per cent. in the wealth of the country as measured by the produce of the income tax. Existing methods that were being employed for redemption were not satisfactory. The sinking fund of 1829 had reduced debt by £40,000,000 but the following sums had been added :

---

[1] Cf. Dudley Baxter's proposal mentioned by Giffen (*op. cit.*) that the railway duty should form the basis of the sinking fund and should be invested cumulatively in the preference or ordinary stock of railways yielding at least 4 per cent. At the end of seventy-two years the nation would hold £200,000,000 of railway stock.

[2] Cf. Pitt's Sinking Fund; Goulburn's and Goschen's conversions of debt.

[3] Budget Speech, 15th April 1875.

£	
8,000,000	(Irish relief)
35,000,000	(Crimean War)
20,000,000	(Compensation to slave owners)
10,000,000	(Purchase of telegraphs)
£73,000,000	

During the same period £120,000,000 had been paid off by the device of terminable annuities. This showed the advantage of adopting a regular system for the repayment of debt. But doubts had arisen as to the use of the terminable annuity and the scope of its application. It was agreed that the policy of converting stock into annuities could only be applied to funds under the control of the Government, *i.e.* Trustee Savings Banks and Post Office Savings Banks funds. But the policy was open to the serious objection that it produced "a kind of spasmodic action." In other words, a situation was created under which a large block of annuities expired at a particular date, and the temptation to appropriate the windfall was often too strong to be resisted. Such, indeed, had been the experience of 1860, and what had been done in 1860 might be done again in 1885. Even if this objection were met a further difficulty still remained. There was a limit to the scope of the policy of conversion. Before long a position would be reached in which it would be difficult to obtain enough stock to convert into fresh terminable annuities.

Northcote was anxious to introduce a more regular and a more extensive plan for the discharge of the debt. His views concerning the "spasmodic" operation of terminable annuities were certainly justified. Nor did it seem probable that a system of revolving annuities could entirely meet his objections. A scheme had been proposed which consisted in the combination of ten-year annuities a portion of which would annually expire and would be replaced by a similar annuity of equal amount and of equal duration.[1] It was argued that, provided these annuities were taxed only on that part which represented interest, a wide market could be obtained for them and an extensive scheme of debt reduction could be introduced with their assistance. It was, however, extremely doubtful whether, even with the proposed exemption of their capital portion from taxation, the annuities would find favour with the public. Hence, although the scheme would operate with as much regularity as any sinking fund, its scope would probably be only slightly less limited than that of the existing system.

Northcote proposed to establish a fixed debt charge which would in the current financial year amount to £27,400,000, would be increased in 1876–7 to £27,700,000 and would finally, from 1877 onwards, be stabilized at £28,000,000.[2] This fixed charge would cover at the outset the payment of interest and a small additional sum for the repayment of the principal of the debt. During the current year it represented an increase of under £200,000 in the debt charge.[3] Two items would not, however, be included in this arrangement: (*a*) The charge on temporary loans raised for such purposes as the building of barracks and fortifications. From time to time the money required for these purposes was obtained by the creation of terminable annuities expiring in 1885.[4] Northcote pointed out that if this charge were not expressly excluded there might be a temptation to include the cost of this expenditure in the fixed charge, in order to avoid an increase of taxation: (*b*) The charge on loans contracted on behalf of local authorities. The money thus raised was re-lent to the authorities and nothing more was involved than a mere book-keeping account.

---

[1] Cf. Hubbard's Speech, 8th June 1875.

[2] The "new" sinking fund was established by 38 & 39 Vic., c. 45, by which the annual surplus of revenue over expenditure is described as the "old sinking fund" (§ 5). Monies issued to the National Debt Commissioners under the new and old sinking funds must be applied by them within six months to the purchase or redemption of debt (§§ 3, 6).

[3] The original budget estimate of the debt charge for 1875 was £27,215,000.

[4] The funds of the Savings Banks were invested in these annuities.

The plan of a fixed debt charge had never yet been formally adopted in England, but the principle behind it was the same as that which underlay the sinking funds of 1716 and 1786. In other words, the interest on debt redeemed was to be applied to the redemption of additional debt; the plan was based upon the operation of compound interest. The sinking fund of 1716 certainly bore a close resemblance to Northcote's measure. By its provisions the surplus over and above the sums required to meet the interest on the debt was applied to the discharge of debt, and the total charge was in a sense fixed by the creation of the General, Aggregate and South Sea Funds. But the law had not expressly laid it down that such and such a sum was to be set aside to meet the charge of the debt, and it was possible without a technical violation of its arrangements to repeal the duties belonging to the three funds.

The sinking fund of 1786 was organized on different lines. A fixed sum had been provided, not a fixed charge. There had accordingly resulted a vast accumulation of stock in the hands of the Commissioners of the National Debt. Northcote's plan seemed to possess decided advantages over this arrangement. When debt was redeemed it was to be cancelled; there was no place for the elaborate machinery by which dividends were paid on redeemed debt and applied to the purchase of debt. Northcote was indeed afraid that his scheme looked very much like the old system and that he might arouse old prejudices. But he maintained that he had avoided "the evils which attach to the Sinking Fund of Dr. Price."

Doubts might exist as to the permanence and continuity of the new arrangement. It had to be admitted that Parliament could not bind its successors in the matter, and Northcote frequently declared that circumstances might arise under which it would be clearly desirable to abolish the sinking fund which he had introduced. But he thought the experiment was worth making, and he believed that few Chancellors would dare to propose to repeal the Act on the ground that they did not like to levy additional taxation, unless they had very good reasons for doing so.

The memories of the old sinking fund were sufficient, however, to prevent Northcote from receiving general support for his measure. At the same time reverence for the system of terminable annuities caused any arrangement which seemed to imply a deviation from that system to be regarded with suspicion. It was argued that while the sinking fund had collapsed under pressure the terminable annuities had withstood the attacks made upon them. A deficit had arisen and a proposal had been made to interfere with their operation; but they had been maintained even though an extra penny of income tax had had to be imposed.[1] Gladstone declared that it had been proved that all sinking funds had resulted in failure and that all recent Parliaments had shown their hostility to them. He also criticized Northcote's proposals so far as they concerned the current financial year on the ground that a surplus of only £168,000 was estimated whereas one of £185,000 was required.[2]

Northcote evidently felt that some concession had to be made to the terminable annuity principle. The lack of security which appeared to characterize his own scheme had been contrasted with " an operation fixed for a given period beyond the reach of capricious change." He declared that within the fixed charge of £28,000,000 they could create as many terminable annuities as they pleased. There was, in fact, no inconsistency between the policy which he had introduced and the policy which had been pursued since 1863.

The unreality of the distinctions which had been drawn between different forms of debt redemption had at last emerged. Thus Disraeli declared in 1875 that he could make no distinction between a sinking fund and terminable annuities. The illusion that greater security was provided by the terminable annuity still persisted, but it was doomed to be shattered before many years had elapsed. Northcote had revealed the absurdity of the contrast by offering to create any number of terminable annuities within the fixed charge. Obviously no arrangement of this sort could make any difference to the amount of debt redeemed. If terminable annuities were created in the future the sinking fund would play a smaller part in the discharge of debt ; if no such annuities were created a larger sum would be available for the fund. But in either case the quantity of debt redeemed would be the same and would be equal to the difference between £28,000,000 and the amount required to meet the charge for interest and management. The combination of the two principles had, in fact, no influence whatever upon the effectiveness of the policy which was adopted.

---

[1] Cf. Childer's Speech, 8th June 1875.

[2] The defence put forward was that no allowance had been made for the normal increase of revenue.

At first it seemed probable that the new sinking fund would be maintained and would not suffer the fate which had fallen upon its predecessors. Thus in 1878 and 1879, in spite of a war in South Africa and disturbances in the East in which it was likely that England would be involved, the Chancellor announced his intention of maintaining the fixed charge of £28,000,000. Nevertheless, although the legal requirements as to debt redemption were formally satisfied, financial policy in these years began to show signs of weakness. Budget deficits were incurred and Northcote, who had met a large portion of the war costs by the issue of Exchequer Bonds, shirked the problem of their repayment and renewed them from year to year.

Undoubtedly there was some justification for this policy. The boom of the early seventies had been followed by a severe trade depression and the revenue ceased to display that buoyancy by which it had hitherto been characterized. Northcote had been partly influenced by the laudable desire to avoid an increase in the funded debt. He imagined that by the use of Exchequer Bonds he could at the same time escape this increase and could spread over two or three years the special costs of the war.

Northcote failed, however, conspicuously in his policy with regard to taxation. An insignificant attempt was made in 1878 to increase the revenue when twopence was added to the income tax. In 1879, however, the Chancellor showed a reluctance to proceed any further.[1] He urged that " the present is not a time in which additional taxation would be borne without distress," and there was a good deal in this contention. But he was on less certain ground when he held "that you ought to make your taxation as little fluctuating as you possibly can; that you ought not to be in a hurry when you get an accidental surplus to give it away: and that when you have an accidental deficit you ought not to be in a hurry to put on taxation." Nor could the distinction which he drew between permanent debt and Bonds be accepted without qualification. He attempted to point out "the very great difference which exists between taking a sum of £2,000,000 or £3,000,000 or whatever it may be, and simply adding it to your permanent Debt, and so putting it out of sight; and postponing the repayment of Bonds for another year, and so keeping your debt before your eyes until you have satisfied yourselves that you can pay it." This argument ignores the obvious temptation which exists to fund Exchequer Bonds and thus to transform them into permanent debt. Only slightly less objectionable than this procedure was the favourite policy of converting Bonds into terminable annuities. This policy was now adopted; of £8,100,000 Exchequer Bonds outstanding in 1880, £6,000,000 were converted into a terminable annuity of £1,350,583 expiring in 1885. This annuity was included in the fixed debt charge which, however, was only increased to £28,800,000.

---

[1] Cf. Budget Speech, 3rd April 1879.

Meanwhile disturbances had broken out in Afghanistan and a loan of £2,000,000 was made to the Government of India. Before long, however, this advance, like many others which the British Government has made, was changed into a gift. It was considered desirable to extinguish the liability by converting the stock of this loan into a terminable annuity of £115,684 10*s*. expiring in 1906.[1] The interest on the loan had fallen outside the fixed debt charge; the terminable annuity was included within the charge, which was accordingly increased by £120,000, and by a further £83,672 12*s*. on account of an annuity created to cancel a deficiency on the fund of the Trustee Savings Banks.[2]

The year 1885 had achieved a financial importance similar to that of 1860. The terminable annuities had been so arranged as to expire simultaneously in that year, so that if no steps were taken to replace them the debt charge would automatically be reduced by £5,135,262 11*s.* 6*d.* A prudent Chancellor could not be expected to leave the temptation which this situation presented to be faced either by himself or his successor. Gladstone in 1881 had thrown out a proposal for renewing the terminable annuities, but he had not found time to carry out any measure of this sort.

---

[1] This annuity was redeemed in 1883–4 out of Exchequer Balances.

[2] The debt charge thus became in 1882 £29,003,672 12*s*.

Childers, who had become Chancellor in 1883, decided to adopt the main feature of Gladstone's proposals. Since a market did not exist for terminable annuities it was necessary, as on former occasions, to deal with the stocks held on trust by public officials. Fortunately there were available two large blocks of securities held under these conditions: (1) Stock standing to the account of the Paymaster-General in trust for suitors in the Court of Chancery. (2) Stock held by the National Debt Commissioners on behalf of the Savings Bank funds.

The Chancery Stock amounted to £61,000,000. Childers proposed to convert £40,000,000 of this into a twenty-year annuity of £2,665,835. Out of a total of £50,000,000 of Savings Banks stock £30,000,000 were to be converted. In this case three annuities of £1,200,000 each were to be created, expiring at the end of five, ten and fifteen years respectively from the date of their creation. When these annuities expired, further sets of fifteen-year annuities were to be created, equivalent in amount to the original £1,200,000 plus the interest on the stock which would then be cancelled.

Meanwhile the original annuities expiring in 1885, to the amount of £5,135,262 11*s.* 6*d.*, were to be converted into an annuity of £684,022 expiring in 1903. Thus the Chancellor not only secured a renewal of the annuities but also a reduction of their charge. In short, the charge was reduced by the difference, approximately, between £7,235,000 and £6,950,000—£285,000. But ultimately these manipulations of the debt had very little practical consequence. Since the establishment of the new sinking fund the existence of the terminable annuities within the fixed debt charge had made no difference to the amount of debt redeemed. The reduction now produced in the charge for terminable annuities only meant that a larger sum was available for the sinking fund. Nor had the theory of the security and certainty of the operation of the terminable annuity much foundation. If no provision had been made the Chancellor of 1885 might have seized the opportunity of the expiration of the annuities to reduce the debt charge. On the other hand, it was equally true, though the fact had not yet been appreciated, that the capital portion of the terminable annuities might be suspended.

Within two years the impossibility of establishing a completely watertight system of redemption was clearly revealed. In 1885 the country again became involved in disturbances abroad [1] which led to a large increase in expenditure. Childers, in presenting his Budget, announced that a deficit of £14,932,000 had to be faced, a situation unknown since the Crimean War. He maintained that "when war or active preparations for war on a large scale come upon us the *raison d'être* for the normal addition to the Sinking Fund is very much weakened." Even after additional taxation had been taken into account there still remained £7,432,000 unprovided for. In the preceding year a sum of £7,600,000 had been applicable to redemption of debt—the capital portion of the terminable annuities (£5,600,000); new sinking fund (£500,000); other sources [2] (£1,500,000). The old sinking fund, namely the actual surplus of income over expenditure, had disappeared. Childers proceeded to raid the first of the sources available, the capital portion of the terminable annuities which he himself had created two years previously. By this arrangement the debt charge was reduced by £4,672,978 and the annuities in question were prolonged for one year.

The myth concerning the inviolability of the terminable annuity was thus completely exposed. It could indeed be argued that the annuity was not abolished but suspended, and that when the emergency had passed the regular course of redemption would be revived. Moreover, it was clearly undesirable to be driven to borrow in order that debt might be repaid. In all this there was some truth. But the suspension of the capital portion of the terminable annuity set a dangerous precedent which future Chancellors might not be slow to follow. So far as any comparison between the annuity and the sinking fund could be drawn, the fund had shown greater vitality. Childers declared that he would not interfere with the arrangement of the fixed debt charge, an arrangement which in 1875 he had tended to regard as a decidedly inferior mode of redemption.

---

[1] The Soudan and Afghanistan.

[2] *viz.* Life Annuities, Redemption of Land Tax, Composition for Stamp Duties.

Nevertheless the sinking fund soon proved itself as incapable of withstanding attack as the terminable annuity. The Liberal Government was defeated on its Budget; the Conservative Government which came into power in 1885 could hardly be expected to resort to the policy of taxation which had caused the downfall of its rival. Accordingly the easiest path was chosen and the sinking fund was suspended. In the following year the Liberals, who again formed a Government, imitated the policy of their predecessors. Harcourt, faced with a deficiency of £540,000, solved his difficulty by taking £613,000 from the original fund and £205,000 representing the addition made to it in 1881.

But the established arrangements with regard to the sinking fund and the terminable annuities were to be still further violated. After the fall of the Liberals on the Home Rule question the Conservatives were returned to power and Goschen became Chancellor in 1887. Clearly the principal question in the matter of debt policy was, in what form would the sinking fund be restored.

The abandonment of the system of the permanent debt charge within twelve years of its institution and after only ten years of its full operation would have been regarded as inconsistent with the principles of sound finance. But it was perfectly possible, while maintaining the system to diminish its effectiveness by fixing at a lower level the total charge. Goschen's policy was to reduce the charge from its original £28,000,000 to £26,000,000.

The defence which was put forward on behalf of this reduction was utterly inadequate.[1] Goschen maintained that "it would be unwise if we were to strain our bow too tight and if in endeavouring to defend the £28,000,000 we were to insist on maintaining any kind of tax permanently at an unreasonable height." He believed that the possibility of a revolt of the payers of direct taxation had to be taken into consideration. "Looking," he said, "to the present situation and at the fact that practically the whole burden of paying off the Debt has to be borne by the payers of Income Tax, I am disposed to think that in the interests of sound finance and with the view of keeping up steady repayments it is desirable to reconsider our position." He was afraid that unless some modification were introduced there would be "far larger inroads upon the Sinking Fund than that which I now propose." While the sinking fund remained as large as it then was its position was quite insecure. Nor could assistance be obtained from any other quarter. The sources of revenue appeared to be exhausted. The outlook was indeed hopeless. "Unless we can discover new sources of Revenue . . . the retention of the present Debt charge must be a matter of increasing difficulty."

---

[1] Budget Speech, 21st April 1887.

The great terminable annuity scheme which Childers had introduced in 1883 had thus to be abandoned. Goschen informed the House of Commons that he had decided to roll into one the "rolling annuities" and to set a limit to their operation. The three annuities of £1,200,000 each were to be converted into a single fifteen-year annuity of £1,983,096. This annuity would expire in 1902 and would not be renewed.

This measure naturally had no independent significance; it was merely part of the arrangement by which the debt charge was reduced to £28,000,000. But it served as an additional proof of the hollowness of the theory that the operation of the terminable annuity was fixed "beyond the reach of capricious change." The events of 1885–87 had destroyed the belief that an inviolable system of redemption had at last been discovered.

The reduction of 1887 was, however, only a stage in the fall of the sinking fund. When in 1889 Goschen carried through his conversion scheme he refused to allow the fund to benefit to the full extent of the reduction in the debt charge. He estimated that a saving of £1,500,000 would be secured, and he thought that the appropriation of £500,000 out of this sum towards the sinking fund would be the most that even a "rigid financial purist" could expect. He asserted that in no previous conversion had the savings been applied to the redemption of debt.[1] The debt charge would accordingly be reduced to £25,000,000, of which roughly £19,500,000 represented the cost of interest and management and £5,500,000 repayment of capital. Thus in spite of the reduction very nearly as large a sum would be available for redemption as there had been with a fixed charge of £26,000,000.

This raiding of the sinking fund did not go uncriticized. Sir T. H. Farrer, two years later, in a work on Goschen's finance[2] disputed the arguments by which the reduction of the fixed charge had been supported. He denied that the revenue, as measured for example by the yield per penny of the income tax, had shown any lack of elasticity. He ridiculed the thesis that the fund had been protected against future attacks by the reduction which Goschen had carried out. "To save the Sinking Fund he throws it overboard."[3] To Farrer, indeed, Goschen's general debt policy appeared thoroughly unsound. Thus the Budget surpluses of the three years 1887–90 were persistently underestimated, the actual surpluses having exceeded the estimated surpluses during these years by over £7,700,000; and the redemption of debt out of these surpluses had to some extent compensated for the reduction of the new sinking fund. But the policy was highly objectionable. Budget surpluses and "the superficial appearance of prosperity" had been produced simply by attacking a fixed and regular method of redemption, and an evil precedent had been set which future Chancellors would not be slow to follow.

Finally, in 1899 Goschen's successor, Sir Michael Hicks-Beach, proceeded to reduce the permanent charge by another £2,000,000 and to fix it at £23,000,000. In the preceding year (1898–9) out of the total charge £17,264,000 had gone to meet interest and the cost of management, £7,736,000 had been devoted to repayment of capital. It could therefore be claimed that the country was not shirking the problem of the debt.

[1] He was evidently unaware of the facts with regard to the institution of the first sinking fund: *vide supra*, p. 22.

[2] *Mr. Goschen's Finance*, 1887–1890.

[3] *Ibid.*, p. 27.

But Hicks-Beach based his policy on two special considerations.[1] First, between 1902 and 1904 a large amount of terminable annuities would expire—the Savings Bank annuity of £2,200,000, the converted annuity of £684,000 and the Chancery annuities of £2,943,000. There would also be a saving on the debt charge of £1,300,000 in 1903 through a reduction of the interest on Consols to 2½ per cent. In consequence £7,000,000 would become available for the new sinking fund, which would amount in 1905–1906 to £9,214,000. Hicks-Beach asserted that nothing of this sort had been contemplated by the founders of the fund. "The new Sinking Fund was never intended to be anything more than a small unappropriated balance of the fixed debt charge." Nor was it wise to leave this temptation to a future Chancellor of the Exchequer; Parliament should be warned by the experience of 1860.

There was, however, another consideration to which Hicks-Beach attached great importance. A proportion, he thought, ought to be observed between the amount of debt redeemed and the amount of debt capable of being purchased in the open market. If the proportion were too high the National Debt Commissioners would find the prices of stocks rising against them and would only be able to purchase debt at a considerable premium. According to the arrangement under which Consols had been converted they would not be redeemable at par until 1923. Would it not be better to slow down the process of redemption until that year rather than send the Commissioners into the market to buy stock at 11 per cent. premium?

The following figures were put forward in support of this view:

	(*a*) Debt held by the Public	(*b*) Debt held by Government Departments	Proportion of Sums devoted to Redemption through Fixed Charge to (*a*)
	£	£	
1884–5 . . .	529,986,000	82,775,000	1·29 per cent.
1889 . . .	358,000,000	162,000,000	2·15 per cent.

From these figures Hicks-Beach argued that the market for Consols had been dangerously narrowed since 1884.

---

[1] Budget Speech, 13th April 1899.

The general defence put forward on behalf of the reduction of the sinking fund was quite unconvincing. It was urged that the taxpayers had a right to benefit not only by reductions of interest but also by reductions of capital. But no attempt was made to reconcile this view with any systematic policy of redemption. It was admitted that the nation enjoyed a state of prosperity hitherto unknown, but it was claimed that it also bore heavier burdens than had fallen upon its ancestors: the increase in expenditure had been considerably greater than the increase in revenue. Yet no evidence was adduced to show that the nation was unable to support a debt charge which was far lighter than the charge with which it had emerged from the Napoleonic Wars.

The measure was strongly opposed by those who felt that the new arrangement would be entirely inadequate and that a far heavier charge could easily be maintained. But complacency was widespread. With arguments which had not been heard since the eighteenth century Members of Parliament maintained that the National Debt, provided it did not "press unduly upon the resources of the people," was an extremely advantageous thing to possess. If it were paid off too rapidly it would be difficult for trustees to find suitable investments for the money they held. The Debt and the Empire were indissolubly linked together.

The reduction of the fixed charge necessitated some interference with the terminable annuities. Hicks-Beach took steps to prolong the Savings Bank annuity from 1902 to 1911, thereby reducing the charge for it to £591,000. On the other hand, he cancelled both a book debt of £13,000,000 due to the Savings Banks and also £15,000,000 of Consols held on behalf of the Banks by the Debt Commissioners, substituting for them annuities of £746,000 and £870,000, which would expire in 1923.

The terminable annuity policy had yielded considerable results in the way of redemption. Between 1863 and 1883 £118,241,908 of stock and debt held by Government Departments had been exchanged for such annuities. From 1860 to 1900 there had been a considerable net reduction in the deadweight debt.

	Funded Debt £	Capital Value of Terminable Annuities £	Unfunded Debt £	Dead-weight Debt £
1860 . .	789,718,208	15,724,361	16,228,300	821,670,869
1870 . .	741,514,681	43,856,394	6,761,500	792,332,575
1880 . .	710,746,359	32,034,785	27,344,900	769,856,044
1890 . .	585,959,852	70,336,149	32,252,305	688,543,306
1900 . .	552,606,898	60,190,755	16,133,000	628,930,653

Though the annual sums available for the new sinking fund increased until 1896 they remained considerably less than the other sources of the annual provision for repayment :

	New Sinking Fund £	Amount of Total Provision for Repayment of Debt £
1880–1	351,402	6,047,212
1884–5	508,447	7,015,104
1890–1	1,271,642	5,974,250
1895–6	2,152,774	7,138,826
1898–9	1,394,459	7,576,601

While, therefore, it is clear that the new sinking fund bore in 1895 a larger proportion to the aggregate amount fixed for redemption than it did in 1880, it had not yet supplanted the terminable annuity as a means of discharging debt.

It is difficult, however, to defend the treatment both of the sinking fund and of the annuities. In a period of increasing wealth, when the nation could easily afford to make adequate provision for the redemption of debt, the fund and the annuity were suspended upon the slightest pretext. Even the old sinking fund, *i.e.* the surplus of revenue over expenditure, was occasionally diverted from its original purpose and applied to expenditure on naval and military works ;[1] the plea that otherwise a loan would have had to have been raised entirely overlooked the fact that the expenditure might have been met out of revenue.

The growth of armaments and the inauguration of the social services had led to an increase in expenditure which had rendered it difficult to maintain the provision for the discharge of the debt. But there had been a more than proportional increase in taxable capacity, as measured by the growth both of *per capita* wealth and of numbers. Moreover, the failure to impose taxation appeared far more clearly in connection with a temporary outlay than with the normal growth of expenditure. Although the country possessed in the income tax an elastic source of revenue, Chancellors preferred to adopt the easier course of meeting the cost of some minor war by borrowing.

---

[1] *e.g.* in 1897 and 1898.

The lack of any scientific plan was undoubtedly a serious disadvantage. The amount of terminable annuities created depended upon the attitude of the Chancellor of the day towards the debt; in 1860 the long annuities had been allowed to expire with hardly any protest. The institution of the new sinking fund, while rendering irrelevant the question of the terminable annuities, yielded no more satisfactory results. The fixed debt charge of £28,000,000 had really no more permanence than any other financial arrangement. Clearly there was no idea that any sanctity was attached to the particular figure which had been fixed in 1875. Goschen saw no objection to devoting two-thirds of the savings arising from his conversion scheme to a remission of taxation and thereby reducing the charge by £1,000,000. Hicks-Beach argued that the taxpayer should benefit by a reduction of the interest on the debt.

There was a conspicuous failure to take advantage of the great increase in wealth which was experienced during the latter half of the century in order to secure the redemption of the greater portion of the debt. A reduction in the deadweight debt had indeed been secured between 1860 and 1900; but this reduction amounted to less than one-quarter of the debt outstanding in 1860.[1] There is little doubt that a resolute policy could have achieved much bigger results than this.

The policy that was actually pursued suffered from two fairly obvious defects. In the first place, there was a complete absence of any determination to hold the debt charge at the level at which it had been fixed in 1875. That charge had in fact no more claim to the term "permanent" than any other element in the financial system. In the second place, there was no attempt to adjust the tax revenue to emergency expenditure on a relatively small scale. The outlay incurred in connection with a minor war was met by temporary borrowing which was ultimately replaced by more permanent forms of debt. In a country which possessed an inelastic tax system this sort of policy might be justifiable. In Great Britain, however, the income tax provided a source of revenue which was easily adaptable to such temporary increases in expenditure. Nor was it any longer possible to justify an inefficient use of the tax on the ground that it was a temporary expedient which was destined shortly to disappear.

---

[1] Moreover, the reduction was largely offset by the increase of debt which occurred in the war of 1899–1902.

Nevertheless, lack of buoyancy in the revenue and inelasticity in the tax system were on different occasions put forward as reasons for adopting a less vigorous policy with regard to the debt. The severe general depression of 1879 and the agricultural depression of the eighties provided, no doubt, some excuse for the failure to impose the taxation which was necessary either to avoid borrowing or to meet sinking fund requirements. But an excuse of this sort cannot be accepted without modification. If the depression of the trade cycle is treated as an adequate justification for an increase of debt or a suspension of sinking funds, it is fairly certain that no progress will be made with a regular plan of redemption.

At a later date Goschen defended his reduction of the fixed charge by reference to the inelasticity of the tax system. Obviously, however, this argument, put forward at a time of growing material prosperity, was of the flimsiest description. It confused the problem of imposing new and productive taxes with the problem of increasing the productivity of existing taxes. There is no doubt that a considerably increased yield could have been derived from the taxes of 1890, if the determination to secure a large redemption of debt had been present.

One other line of defence still has to be considered. It was urged that the conditions of the market for public securities were such as to make it undesirable to proceed any further with the reduction of debt. If the holdings of these securities by the Debt Commissioners were excluded it was argued that the amount of debt held by the public was so limited that purchases on a large scale would force up considerably the prices of stocks. It might therefore be expedient when a certain point had been reached to check the operation of the cumulative sinking fund. Alongside of this argument ran the old doctrine concerning the advantages which public securities offered as channels of investment. With the development of an efficient banking system the question was indeed no longer one of the profitable employment of idle balances. But it could be claimed that British public securities provided in a degree which could not be found elsewhere the qualities which are required for trustee investments.

The fact that purchase of debt below par, as opposed to its redemption at par, drives up the prices of securities and thereby makes the operation more expensive presents no new problem. On it, for example, was based the opposition of Sinclair to Pitt's sinking fund. Clearly, if the sums annually applied to redemption are large proportionately to the amount of debt which may come into the market a considerable rise in the prices of securities will occur. But such a rise is not usually regarded in an unfavourable light. Certain difficulties were indeed introduced after 1890 by the security given to the holder of Consols against redemption at par until 1923. Thereby was created, in the case of a continuous fall in the rate of interest, the necessity of purchasing debt *above* par. But Governments are almost invariably anxious to maintain the prices of public securities and to show the world how high their credit stands. From the purely economic standpoint and apart from questions of prestige they naturally wish to borrow as cheaply as possible. Moreover, small attention is usually paid to questions affecting the general rate of interest, and it is popularly supposed that Governments can by their debt policy very largely determine the rate at which they borrow. Hence a large part of the argument concerning the effect of sinking purchases on the prices of securities is offset by doctrines as to the necessity of maintaining public credit. Thus, when the price of Consols was falling in the twentieth century it was strongly urged that a vigorous policy of repurchase of debt ought to be pursued. It is clear, however, that the effect of repurchase upon the prices of public securities may easily be exaggerated, and that such rise of prices as is produced is by no means disadvantageous from every point of view.

Nor could anything have been said on behalf of the argument that a public debt was necessary in order to provide a means of investment for trust funds. The scope of trustee investments could easily be extended and has been extended. Thus in 1900 the Colonial Stock Act permitted trustees to invest in certain colonial stocks registered in the United Kingdom. The idea that a public debt must be not only kept alive but maintained at a considerable height for this purpose is indeed almost too absurd to be worth consideration.

A rude shock was administered by the events which occurred at the end of the century. The outbreak of war in South Africa in 1899 resulted ultimately in a complete neutralization of the efforts of the preceding twenty-five years. A British Chancellor of the Exchequer might well feel himself to be engaged in a Sisyphean labour.

CHAPTER XII

TWO AND A HALF PER CENT.

While attempts, however inadequate, were being made to carry out a systematic policy of redemption, considerable changes were taking place in the character and composition of the debt. Probably the most important of these changes was the conversion of the debt from a 3 per cent. to a $2\frac{1}{2}$ per cent. basis. Thereby a considerable saving was secured, which was available for the use of the sinking fund, for a reduction in the burden of taxation or for an increase in other forms of expenditure.

But apart from this alteration in the denomination of the stocks, changes of a smaller order, though no less significant in their nature, were introduced into the character of the debt. Hitherto the purpose for which loans had been raised had been almost wholly associated with war expenditure. The objects to which public borrowings had been applied had been political in character, and the State had not acquired in return for its outlay assets with a definite market value.

A policy of "productive" expenditure would not have received much support during the eighteenth century and the greater part of the nineteenth either from scientific or from popular opinion. Wallace, indeed, thought that borrowing might be resorted to "if the Government has some grand or useful scheme in view."[1] Adam Smith held that even in "the simple system of natural liberty" it would be the duty of the sovereign to erect and maintain "certain public works and certain public institutions, which it can never be for the interest of any individual or small number of individuals to erect and maintain."[2] But on the whole the trend of thought was, until the latter part of the nineteenth century, opposed to the development either of public enterprise or of public ownership.

---

[1] *Vide supra*, p. 77.

[2] *Wealth of Nations* (Cannan's Edition), Vol. II, p. 185.

A certain class of business, the management of the postal service, had been in the hands of the State since the time of Charles I; but its nature was such as not to require any large outlay. Adam Smith pointed out: "The capital to be advanced is not very considerable. There is no mystery in the business. The returns are not only certain but immediate."[1] And this condition might have persisted had it not been thought desirable that the State should buy up the new system of transmitting messages which telegraphy provided.

In 1868 the Government decided to purchase the telegraph system of the country and introduced a Bill for that purpose. The cost of the purchase had originally been estimated at £4,000,000,[2] but before long this sum had risen to nearly £7,000,000. In order to raise the money £7,000,000 in 3 per cent. Consols were issued at the price of £92 4*s*. This debt was subsequently increased by further creation of Consols to nearly £11,000,000, until in 1891 the Treasury decided to close the capital account. Since that time the additional sums required for extensions of the system have been obtained by the creation of terminable annuities which are charged upon the Post Office vote.

The purchase price was undoubtedly excessive. Fawcett, who was Postmaster-General in 1882, declared that "the country paid a sum of £3,500,000 more for the rights and property of the Telegraph Companies than they were worth. . . . If the telegraphs had been bought at a proper price the sum paid for them would have been £7,000,000 instead of £10,500,000."[3] Nor did the financial results of the operation of the system prove satisfactory. Losses on working were experienced and no surplus was available for meeting interest on the original capital. Exact estimates are, however, difficult since capital outlay on extensions was in some years met out of revenue.

Different both in its nature and in its results was the purchase of the Suez Canal Shares in 1875. Political as well as economic interests were at stake, and the purchase could have been defended even if the investment had resulted—as it has certainly not resulted—in an economic loss. At the time political issues overshadowed all other questions, the Government's desire being to prevent the shares from falling into French hands, and few persons can have foreseen that the investment would provide the State with the most important of its few revenue-producing assets.

---

[1] *Wealth of Nations* (Cannan's Edition), Vol. II, p. 303.

[2] Buxton, *Finance and Politics*, Vol. II, p. 50.

[3] Statement, 11th August 1882.

The sum required for the purchase of the shares, including a commission to the firm of Rothschild of £99,000, amounted to £4,076,622. The greater part of this was raised by the issue of £4,000,000 of 3½ per cent. Exchequer Bonds redeemable within thirty-six years by the application of an annual sum not exceeding £200,000 to the payment of interest and principal. By this transaction 176,602 shares out of a total of 400,000 were purchased and became the property of the British Government.

The Government did not, however, become immediately entitled to receive the dividends on the shares. The Khedive had been driven to make the sale through the desperate financial straits in which he had involved himself. He had already mortgaged the dividends for a period of twenty-five years and they would not be free until 1895. Accordingly he agreed to make an annual payment of £200,000, amounting to 5 per cent. on the purchase money, until the period should elapse. In 1895–6 the British Government received the dividends which amounted to £675,418 ; these had grown by 1914 to £1,246,370.[1]

The investment has certainly turned out to be a profitable one. Nevertheless the importance of the Suez Canal shares lies not so much in the ownership of a piece of revenue-yielding property which they represent but in the political control of the route to India which they secure. Hence their inclusion at market value in the estimated assets of the State is misleading.[2] The British Government does not contemplate the sale of the shares on the open market and its interest is confined to the dividends which it receives upon them.

---

[1] The sums due on the repayment of drawn shares were reinvested by the National Debt Commissioners in Consols.

[2] In 1914 out of total assets amounting to £38,279,578 the estimated market value of the Suez Canal Shares represented £34,929,000.

A third change which occurred in the character of the debt was mainly of a book-keeping nature. From the end of the eighteenth century advances had been made by the Central Government to local authorities for the construction of public works. The system had received a considerable extension after the Napoleonic Wars when works of this sort were promoted for the purpose of providing employment. In 1817 Exchequer Loan Commissioners were appointed who made advances to local authorities principally in Exchequer Bills. In 1842 this arrangement was abandoned and the administration of local loans was placed in the hands of the National Debt Commissioners. The Treasury was authorized to make advances out of the Consolidated Fund of £360,000 per annum to the Commissioners, who were appointed Trustees of the Public Works Loans Fund.

The arrangements for the advances to local authorities and the receipts in respect of these advances had introduced a good deal of confusion into the public accounts. Originally the whole receipts had been treated as miscellaneous revenue. Subsequently a change had been introduced and the receipts had been absorbed into Exchequer Balances out of which also advances, when not in the form of Exchequer Bonds or Bills, had been made. Obviously a distinction between the payment of interest and the repayment of principal was required. It was not desirable that receipts in respect of interest on these loans should be taken along with principal repaid into Exchequer Balances.

In 1874 the system was modified by Northcote. Interest received on local loans was to be treated as revenue, repayments of principal alone going to swell Balances.[1] But difficulties still remained. There was a continuous growth of local loans which was met partly out of Exchequer Balances, partly by the creation of unfunded debt—Exchequer Bonds, Exchequer Bills and Treasury Bills,[2] and partly out of Savings Banks funds in the hands of the National Debt Commissioners.

---

[1] This led to a windfall increase of revenue, which was met by the creation of a terminable annuity of £651,681 expiring in 1885.

[2] The issue of the Treasury Bill was regulated by the Treasury Bill Act, 1877 (40 Vic., c. 2), and since then it has come to supersede the Exchequer Bill. It is subject to discount and resembles a bill of exchange.

As Goschen pointed out in 1887: "The result of this most confused and unsatisfactory state of affairs is that nobody can see at a glance how much money we really have contributed towards local loans or what the charge on the revenue is on account of these local loans." Moreover, the policy of raising the money by the creation of unfunded debt gave rise to a good deal of uncertainty. It was indeed profitable to borrow on Treasury Bills at 2½ per cent. and re-lend the money to local authorities at over 3 per cent. But the Government might find itself in the position of having to renew this debt at an awkward moment.

Some solution of the latter problem could be found in funding. Thus in 1881 outstanding Exchequer Bonds created for the purpose of local advances, amounting to £8,600,000, were converted into £2,764,565 of Consols and £5,838,441 of 2½ per cents., a sinking fund being attached, calculated to redeem the respective amounts of stock in twenty-five years. But the confusion present in the system still persisted.

Goschen dealt with the problem in 1887 by transferring the system of local loans to a separate account.[1] He declared that in view of the growing character of the demand for these loans he proposed "to take it entirely out of the Budget." He created a new security—Local Loans Stock—and cancelled against it certain amounts of 3 per cents. and Public Works Loan Bonds. The results of his operations were as follows: [2]

Stock and Bonds cancelled, £36,027,672
3 per cent. Local Loans Stock created, £36,526,057

of which £16,619,980 were allotted to the Trustee Savings Banks Fund and £19,906,077 to the Post Office Savings Banks Fund.

Thus at the outset the new stock did not come into the hands of the public but was held by the National Debt Commissioners. The stock was first placed on the market in January 1888, when the Commissioners caused ten millions to be offered by the Bank of England for public tender in exchange for 3 per cents.

---

[1] *Vide* Budget Speech, 21st April 1887.

[2] *Parliamentary Papers*, 1890–1, XLVIII, p. 806.

It was fairly clear that the State had suffered a loss on the system which was now superseded. A slight profit had been obtained by the difference between the rate at which the money had been borrowed and the rate at which it had been re-lent to the local authorities. But a large proportion of the advances had had to be written off as bad debts. The following figures were put forward for the period 1792–1887:

	£
Sums advanced	106,882,120
Sums repaid	57,702,148
Sums remitted	12,020,322
Sums outstanding	37,159,650

A further sum of £633,593 was written off in 1887, and the amount outstanding was thereby reduced to £36,526,057.

Goschen's motives in the creation of a new 3 per cent. stock were probably not as simple as he appeared to suggest. He referred to his anxiety "that the public should know precisely how it stands"; or, in other words, that it should know what liabilities it had incurred on account of advances to local authorities and how it had raised the money to meet these advances. This intention was entirely praiseworthy. But there was almost certainly present an additional anxiety on his own part to discover the market price of a 3 per cent. Government security irredeemable, as Local Loans Stock was, for twenty-five years. Goschen, in fact, hoped that some light would be thrown by market transactions in this stock on the possibility of converting the existing 3 per cents., the prices of which were kept down by the fact that they were repayable within a year and therefore subject to this very possibility. As an arrangement for raising money for local authorities the creation of Local Loans Stock possessed definite disadvantages. The sums required could have been borrowed more cheaply by the issue of 2¾ per cent. Consols, since the price of Consols normally stood relatively higher than that of Local Loans Stock.[1] Thus it is doubtful whether apart from considerations connected with the introduction of a conversion scheme Local Loans Stock would have been created.

---

[1] Cf. Sir T. H. Farrer, *Mr. Goschen's Finance*, 1887–1890, pp. 51–2.

The debt which the State has incurred on account of the issue of Local Loans Stock stands on a different footing from the rest of the National Debt. The Treasury is here an intermediary between the local authority and the investor, enabling the former by the interposition of the superior credit of the British Government to obtain money more cheaply than it could otherwise raise it. Though the State has to meet the interest on the stock, it receives from the local authorities interest and repayment of the advances made to them. The growth of the stock, therefore, indicates a development of the economic activities of these authorities and, so long as they remain solvent, does not involve a burden upon the taxpayer. Nevertheless, the stock represents a direct liability of the British Government and should properly be included in the National Debt. The practice adopted in the Finance Accounts of the United Kingdom of excluding the stock from the Debt and placing it among the Guaranteed Loans is thus entirely unjustifiable.

Goschen's chief claim to fame, however, rests not upon his policy with regard to the financial relations between the State and the local authorities, but upon the conversion of debt which he brought about in 1888–9.[1]

For a considerable time after Gladstone's ill-fated scheme of 1853 the prices of the stocks had not touched a level which would permit a reduction of interest on the 3 per cent. debt. At length, however, in 1880 Consols again reached par, and in 1884[2] Childers introduced a set of conversion proposals. He offered to all holders of 3 per cent. stocks two alternatives: (i) £102 of new 2¾ per cent. stock for £100 of threes, (ii) £108 of new 2½ per cent. stock for £100 of threes. Neither stock was to be redeemable until 1905. The yields were thus, in the case of the first alternative £2 16*s*. 1*d*. per cent., in the case of the second alternative £2 14*s*. per cent.

The results of Childers' scheme were far from successful. A small amount of stock was converted and of this amount more than one-half was in the hands of Government departments.

---

[1] For a full account of this conversion see *Conversion and Redemption*, by Sir E. W. Hamilton.

[2] On 7th April 1884 Consols stood at 101¾ (ex dividend).

The 3 per cent. stock converted and the amounts of 2¾ per cent. and 2½ per cent. stocks created were as follows :[1]

	3 per cents. converted	Annuities created in Exchange	
		2¾ per cents.	2½ per cents.
	£	£	£
Stocks held by Government Departments	11,950,124	—	12,906,134
Stocks held on Private Account	10,412,472	4,647,799	6,324,267
Totals	£22,362,596	£4,647,799	£19,230,401

The increase in the capital of the debt which was caused by this operation was £1,515,604 ; the immediate decrease in the annual charge was £46,756.

When Goschen took office conditions were undoubtedly more favourable for the successful carrying out of a big conversion scheme. The political outlook was clearer : the prices of Consols had been maintained.

	Highest	Lowest
1883	102¾	99⅜
1884	102⅝	99⅛
1885	103⅝	94⅝
1886	102¼	99¼
1887	103⅝	100⅛
1888	103⅝	99⅛

Some attempt was made, as we have seen, in 1887 to gauge the conditions of the market by the creation of Local Loans Stock. This stock was offered for tender by the National Debt Commissioners in January 1888 ; and since it was irredeemable for twenty-five years its price immediately stood higher than the prices of Consols and Reduced Threes which were redeemable after a year's notice. The average amounts of stock tendered for £100 Local Loans Stock were £101 16*s*. 7*d*. Consols and £101 5*s*. 11*d*. Reduced Three Per Cents. Sir E. W. Hamilton, himself a Treasury official and in charge of the operation, has told us that the issue of Local Loans Stock was " a sort of pilot balloon for the conversion."

Prior to the introduction of the proposals two principal questions had to be settled. First, should the scheme apply to all the 3 per cent. stocks or only to certain selected stocks? The 3 per cents. represented at this time the major portion of the debt, and a scheme which dealt with them all would involve financial operations on a scale which was then regarded as gigantic. The amounts of these stocks were as follows:

---

[1] *Parliamentary Papers*, 1890–1, XLVIII, p. 681.

	Total	Amount held by Public
	£	£
Three per cent. Consols .	322,681,000	289,000,000
,, ,, ,, Reduced .	68,912,000	59,000,000
New Three Per Cents. (1844)	166,399,000	152,000,000
Total	£557,992,000	£500,000,000

Secondly, should the conversion be on a compulsory or on a voluntary basis? Gladstone in 1853 and Childers in 1884 had made offers to the holders of the 3 per cents. and had refrained from the application of compulsion. The fact that a year's notice had to be given before the holders of Consols and Reduced Threes could be paid off,[1] coupled with the example of Gladstone's failure in 1853, might well frighten a Chancellor who proposed to apply compulsory conversion.

These problems were solved by the passing in March 1888 of a Conversion Act[2] which at the same time forced holders of the New Threes to accept either repayment or a new 2¾ per cent. stock and also offered this new stock to such holders of Consols and Reduced Threes as might be willing to convert. The new stock which was created by the Act was to bear interest at 2¾ per cent. until 1903, when the rate would be reduced to 2½ per cent. guaranteed until 1923, the stock being redeemable in that year without notice. The conversion would take place in either case at par and there would therefore be no addition to the capital of the debt.

An important difference existed between the two main classes of creditors to whom the voluntary part of the scheme applied. The stock of the 3 per cent. Reduced was relatively small in amount. Thus the holders were not in such a strong position as were the holders of Consols to resist a forced conversion, and they stood to gain nothing by a refusal to accept the terms offered to them. In actual fact the Government, as an inducement, provided a bonus of five shillings per cent. to holders of Consols and of 3 per cent. Reduced who agreed to surrender their stock.[1]

---

[1] New Threes could be paid off without notice.

[2] 51 & 52 Vic., c. 2.

The result of this operation was completely successful. Out of a total of £592,618,000 of 3 per cent. stocks[2] £549,094,000 were converted into the new $2\frac{3}{4}$ per cent. security. By the end of the year the dissentient holders of New Threes to the extent of £761,684 had been paid off, and there remained outstanding only £36,583,911 of Consols and £5,741,263 of Reduced Threes. Part of the stock which was thus converted was represented by a resuscitation of a portion of the £40,000,000 of Chancery Stock which had been cancelled in 1883 in exchange for a terminable annuity.[3] The capital outstanding, amounting to £34,625,778, was re-transferred into 3 per cent. Consols in order that it might come under the conversion scheme. Subsequently the new stock created was re-exchanged for an annuity of £2,605,706 terminating in 1904.

Meanwhile the success of the conversion had prompted the Chancellor to propose legislation which would apply compulsion to the remaining holders of the 3 per cents. Accordingly on 5th July 1888, by a resolution of the House of Commons, the necessary year's notice of redemption was given to these holders. Finally, on 11th April 1889 the National Debt Redemption Act[4] was passed providing for the repayment from 6th July onwards of such holders of stock as had refused to accept the original conversion offer.

Care was taken that as much of the stocks as possible should be got out of the way before the date of redemption arrived. The Treasury was empowered to pay off holders in advance[5] and five millions were actually raised on Treasury Bills and devoted to this purpose. Again the Treasury might authorize the National Debt Commissioners to exchange $2\frac{3}{4}$ per cent. stock and Local Loans Stock for Consols or 3 per cent. Reduced on such terms as the Commissioners might approve.[1] The Treasury itself might, before the arrival of the redemption date, offer to the Commissioners $2\frac{3}{4}$ per cent. Consols in exchange for 3 per cent. Consols or 3 per cent. Reduced.[2]

---

[1] Conversion Act (1888), Part II, § 10. The Treasury was also given power to authorize a payment of 1*s.* 6*d.* per cent. to recognized agents who gave assent on behalf of their clients.

[2] Including the Chancery Stock mentioned below.

[3] *Vide supra*, p. 191.

[4] 52 & 53 Vic., c. 4.

[5] Redemption Act, § 2.

On 6th July 1889 the stocks which had to be paid off amounted to £19,723,885. Out of this sum, however, only £11,874,110 were claimed, and the balance for which no claims had been entered was automatically converted into $2\frac{3}{4}$ per cent. Consols. A small amount (£576,366) of unclaimed stocks in the hands of the National Debt Commissioners was similarly converted.

The amounts which had to be paid off were thus relatively small and there was no difficulty in raising them. Powers had been taken to borrow what was required by the creation of new stock or by the issue of Exchequer Bonds, Exchequer Bills or Treasury Bills. The sums were, in fact, raised by the creation of unfunded debt,[3] principally in the form of Exchequer Bonds and Treasury Bills. The actual expenses of the conversion were met out of the old sinking fund.

The conversion of 1888–9 is undoubtedly the most successful operation of its kind that has ever been performed upon the National Debt. Out of a total of £590,824,407 of 3 per cents. available [4] no less than £565,684,465 were converted into $2\frac{3}{4}$ per cent. stock. The saving realized on the annual charge amounted to over £1,400,000, and when the rate fell to $2\frac{1}{2}$ per cent. in 1903 this saving would be doubled.[5] The amount of re-borrowing that was required was negligible; the reduction of interest was accepted with hardly any opposition.

The scheme itself suffered only from one minor defect. The payments made under the Conversion Act to holders of Consols and Reduced Threes and to their agents in order to induce them to convert were almost certainly unnecessary. They made the Chancellor's path smoother, but they involved an expense which could and ought to have been avoided. The real weakness, however, of the financial policy of which the Conversion scheme formed a part was the failure to apply the whole of the savings secured to the redemption of debt. It is certainly true that if the principle of a fixed charge is rigidly adhered to conversion will add to the repayment portion of that charge. But against this there must be set the fact that owing to the fall in the rate of interest there is a slackening in the rate of repayment. Thus the claim that almost as much was being devoted to repayment as before, in spite of the reduction of the fixed charge by £1,000,000, entirely ignored the question of the rate at which debt would be repaid in the future.

---

[1] Redemption Act, § 3 (1).

[2] *Ibid.*, § 3 (2).

[3] The addition to the unfunded debt was roughly £18,500,000. Further, £5,785,689 of stock were converted into a temporary Book Debt.

[4] Including the 3 per cent. Consols created in respect of the Chancery Annuity, and deducting £1,793,878 of stock cancelled by the operation of the sinking fund.

[5] *Parliamentary Papers*, 1890–1, XLVIII, p. 687.

Conversion had been made possible through a fall in the rate of interest and an accompanying rise in the prices of Government securities. By the end of the century, however, a definite change of trend had occurred. Under the influence of a rising gold price level the rate of interest began to rise and a depreciation of fixed interest stocks occurred.[1] On top of this came another influence operating in the same direction—the extensive borrowing which the war in South Africa necessitated.

The duration of the South African War was underestimated and this underestimation naturally had its reactions upon financial policy. In the first place, taxation though increased was probably not raised to the height to which it would have been raised had the actual duration of the war been more clearly foreseen. Secondly, the borrowing methods which

---

[1] Consols are not a proper object of comparison, since the rate payable on them was to be reduced in 1903 by ¼ per cent. They had touched their highest monthly average price (113) in the second half of 1896 and the first half of 1897. By July 1900 the monthly price was below par, and in March 1903 it had fallen as low as 91.

The prices of 3 per cent. Local Loans Stock (1912) at this time were as follows:

	Highest	Lowest		Highest	Lowest
1897 . . .	115	111½	1901 . . .	101½	97¾
1898 . . .	113¾	108	1902 . . .	102⅝	98⅞
1899 . . .	111	100	1903 . . .	100	98¼
1900 . . .	105⅞	98¾			

were adopted at the outset were similar to those by which minor wars had been financed. Loans were at first raised by the creation of unfunded debt, and an issue of Consols did not take place until the spring of 1901, a year and a half after the outbreak of the war.

There was an issue of Treasury Bills in 1899 to the extent of £8,000,000, but a war loan was not introduced until March 1900. This loan took the form of an offer made directly to the public of £30,000,000 of 2¾ per cent. War Stock, repayable at par in ten years' time, at the price of 98½. The terms of this offer were severely criticized and Hicks-Beach had subsequently to agree that too much had been paid for the money which had been raised. He admitted that the loan stood at a premium of 1¾ and that the amount asked for had been subscribed ten times over. On the other hand, he maintained that the issue of short-term stock was preferable to the creation of Consols, and that in view of the risk of not getting the money it was better to sell stock at a fixed price than to have a tender.[1] He also pointed out that by the methods which he had employed he had avoided underwriting, guarantees and commissions. His defence is, however, unconvincing. Short-term debt can be and generally is renewed or converted into permanent debt. There was therefore no real ground for the issue of ten-year stock as opposed to the issue of Consols, while Consols would have represented a less expensive form of borrowing.

The same policy was pursued throughout 1900. In the course of obtaining further borrowing powers Hicks-Beach declared his intention " to adhere to the principle established by the War Loan Act that we should, as far as possible, earmark our borrowing for the purposes of this war as temporary borrowing, and that it should automatically almost point out to the Chancellor of the Exchequer of the day that it is his duty at the earliest possible time to make provision for the redemption of the loan." [2] Something was required intermediate between Treasury Bills and War Loan, and an issue of 3 per cent. Exchequer Bonds was arranged. These Bonds were of two series—one of £10,000,000 three-year Bonds at the price of 98, and another of £3,000,000 five-year Bonds at the price of 98½. In the autumn a further £11,000,000 of 3 per cent. Exchequer Bonds were created, the average price being 97¼. The floating debt was also increased by an issue of £5,000,000 of Treasury Bills, of which the total amount outstanding on 31st March 1901 was £21,133,000.

---

[1] Speech on the War Loan Bill, 13th March 1900.

[2] Speech of 30th July 1900.

Meanwhile the new sinking fund and with it the capital portion of the terminable annuities had been suspended.[1] And this suspension was wholly justifiable, since it was clearly undesirable that borrowing and repayment should be carried on together. The theory of a short war had not indeed been pushed so far as to suggest that the fund could be maintained in operation without any very great appearance of inconsistency.[2]

In 1901 Hicks-Beach realized that his loan policy had been based on a false estimate of the position. He had borrowed on short-term securities and had increased the unfunded debt to such an extent as to risk severe criticism.[3] A deficit of £55,347,000 was estimated for the coming year and a loan of £60,000,000 was required. This could not be raised by the creation of further Exchequer Bonds, and Hicks-Beach was thus at last driven to the use of funded debt. Accordingly £60,000,000 of 2¾ per cent. Consols were issued at the price of 94½. In the following year there was a further loan of £32,000,000 in the same stock, the price of issue being 93½.[4]

The war was ended by June 1902. In his Budget speech of the following year C. T. Ritchie attempted to put forward an estimate of the cost of the wars in South Africa and China during the preceding four years, of the proportions met respectively out of revenue and out of loans, and of the addition to the capital of the debt. The total cost he put at £217,000,000, or more than a quarter as much as the computed cost of the great French war which lasted eight times as long. Of this amount £67,500,000 or 31 per cent. had been defrayed out of revenue, the remainder, £149,500,000 or 69 per cent., out of loans.[1] Meanwhile the Debt had been increased by £159,000,000, this increase being distributed as follows :

---

[1] This suspension was continued until the termination of the war in June 1902, when the sinking fund was restored.

[2] Contrast Northcote's adherence to the fixed debt charge in 1879.

[3] Cf. Banbury's letter to *The Times*, quoted Mallet, *British Budgets* (1887–1913), p. 173.

[4] In both cases half of the loan was placed privately, the terms being the same as those for the public issue.

	£
I. Funded Debt :	
Consols	92,000,000
II. Unfunded Debt :	
1. War Loan	30,000,000
2. Exchequer Bonds	24,000,000
3. Treasury Bills	13,000,000

Thus nearly the whole of the efforts which had been devoted during the preceding thirty years to the reduction of debt had been neutralized. Moreover, the unfunded debt, in the shape of Exchequer Bonds and Treasury Bills, had undergone a considerable increase. There was obviously good ground for arguing, that, in spite of the difficulties which the normal growth of expenditure presented, a vigorous policy of redemption ought to be pursued.

This argument was reinforced by the considerations which were prompted by the fall which had occurred in the price of Consols. This fall was apparently not simply the result of general economic factors affecting the rate of interest. A comparison of the yield of Consols with that of the public securities of other countries seemed to indicate a relative decline in the public credit of Great Britain. Thus, whereas the yield of Consols had risen between 1898 and 1903 from £2 to £2 15*s*. per cent., the yield of French Rentes had risen only from £2 19*s*. to £3 1*s*. 3*d*. and that of German Threes from £3 4*s*. to £3 6*s*. 4*d*. Ritchie proposed, however, to take the year 1893 as a basis for comparison. The yield of Consols was then £2 12*s*., that of Rentes £3 2*s*., and that of German Threes £3 10*s*. 6*d*. He even came to the conclusion that there was some ground for congratulation in the fact that the difference was not more marked.[2]

All these calculations tended to overlook the fact that the reduction in the rate of interest payable on Consols to $2\frac{1}{2}$ per cent. in 1903 had been discounted in previous years. Moreover, undue prominence was probably given to the influence which the redemption policy pursued by a Government has in the long run upon the prices of its securities. Nevertheless, so far as short periods are concerned, redemption policy is probably the most important of the factors affecting prices; while in general the effect of such a policy must be to maintain the prices of these securities at a higher level than they would attain if such a policy were not in operation.

---

[1] If, however, allowance were made for (*a*) £4,000,000 Transvaal guaranteed loan, (*b*) £30,000,000 war contribution from the Transvaal, (*c*) Repayment of £3,000,000 temporarily advanced to the Transvaal Government, (*d*) British share of Chinese indemnity (£6,000,000), the proportions would be 38 to 62.

[2] Budget Speech, 23rd April 1903.

Yet in spite of the serious growth of debt, Ritchie proceeded to rake up excuses for a policy of fixing the debt charge at a figure considerably below that at which it had been set by Northcote. The debt, he admitted, stood approximately at the level at which it had been in 1875. But interest had been reduced from 3 to $2\frac{1}{2}$ per cent. since that time, and it might therefore be calculated that a fixed charge of £25,500,000 would now be as efficient in the way of redemption as £28,000,000 had then been. Moreover, the sinking fund had come to bear an ever larger proportion to the debt:[1] and although the proportion for the current year would (with a total fixed charge of £27,000,000) be smaller than that for 1899, nevertheless if no change occurred, the ratio of the fund to the debt would in 1908 be equal to 1·25 per cent. Finally, the fund would operate much more effectively than it had previously operated since it would be devoted to purchasing stock at or below par. "If the debt is not added to," the Chancellor declared, "and if the annual charge is maintained at the proposed amount, the whole of this gigantic debt can be wiped out within fifty years from now. That is a startling proposition, but I believe it to be none the less true."[2] This was a splendid prospect, but unfortunately the policy that was actually adopted fell considerably short of the aims that were proposed. The war debt interest of £4,500,000

---

[1] The figures for the percentage of sinking fund to debt were as follows:

1875	0·53	1899	0·92
1887	0·67	1903	0·85
1889	0·73		

[2] Budget Speech, 23rd April 1903.

was taken inside the fixed charge, but this charge was placed at only £27,000,000. It was clear therefore, and indeed it was pointed out at the time, that the charge was in reality being fixed £500,000 below the level to which it had been reduced by Hicks-Beach in 1899.[1]

More serious attention was paid to the debt, after the reconstruction of the Government, by the new Chancellor, Mr. Austin Chamberlain. Mr. Chamberlain admitted that he was troubled by the problems which the volume of the floating debt presented.[2] In particular he was anxious to deal with £14,000,000 of Exchequer Bonds which fell due in December 1905. £4,000,000 of these Bonds he proposed to pay off, and the remaining £10,000,000 were to be subjected to what might be described as " a limited funding operation." In short, these £10,000,000 of Bonds were to be replaced by new Bonds of equivalent amount current for ten years, with the provision, however, that one-tenth was to be drawn and paid off each year. To meet this new redemption charge the fixed debt charge was to be raised from £27,000,000 to £28,000,000. Thus Mr. Chamberlain asserted : " The Sinking Fund which I propose to attach to the new Bonds will form part of the bargain with the public creditor and cannot therefore be suspended under any circumstances." [3]

Even more was to be hoped from the return of a Liberal Government to power in 1906. The Liberal party had for some time been understood to hold strong views as to the necessity for adopting a vigorous policy towards the debt. Gladstone and Harcourt had argued in support of an effective system of redemption and had severely criticized the borrowing methods of their opponents. Buxton, both in his *Finance and Politics* and in his speeches in the House, had maintained similar views. Goschen and Hicks-Beach had been attacked by the Liberals for their reductions of the fixed debt charge.

At the outset, under the Chancellorship of Mr. Asquith, the Liberals certainly put into practice those doctrines which they had preached so assiduously when they were in opposition. They were indeed fortunate in inheriting from their predecessors a surplus of £3,466,000 which went automatically to debt redemption under the provisions of the old sinking fund. The new Chancellor showed himself, however, not content to rely upon Budget surpluses and increased the fixed charge by £500,000 to £28,500,000.[1]

---

[1] The defence was put forward that the fund would gain by the saving in interest payable on Consols, amounting to £1,250,000.

[2] The total floating debt was £77,500,000, made up of (*a*) £21,000,000, Treasury Bills ; (*b*) £30,000,000, War Stock ; (*c*) £26,500,000, Exchequer Bonds.

[3] Budget Speech, 10th April 1905.

More important perhaps than the addition to the fixed charge was the fact that a definite policy was adopted towards three debt problems which awaited solution.

In the first place, there had been a considerable growth since the end of the century of the item described in the Finance Accounts as "Other Capital Liabilities." This item fell outside the dead-weight debt and represented debt incurred for the purpose of defence or of improvements. The practice had in fact grown up of borrowing sums required for the construction of naval and military works on terminable annuities which were charged on the votes of the departments concerned. The policy was probably suggested by the procedure which had for some years been adopted with regard to the telegraph expenditure of the Post Office.[2] It was defended on the grounds that repayment was automatically secured by the methods of borrowing which were employed, and that there were assets against the debt in the shape of the works which had been constructed.

The growth of these other capital liabilities, however, soon gave rise to doubts as to the wisdom of the policy which had created them. Mr. Chamberlain had held that the "procedure should be reserved for exceptional occasions." Sir Edgar Vincent had criticized the whole system by declaring that there was no generic difference between dead-weight debt and debt represented by these capital liabilities. "A military harbour appeared to him to be no more a national asset than a battleship, or very little more."[3]

[1] There was also £500,000 available from the Chinese indemnity of 1901.

[2] *Vide supra*, p. 204. Sometimes the borrowing which gave rise to these "other capital liabilities" took the form of an issue of Exchequer Bonds. £6,000,000 were thus raised in 1905 for naval and military works.

[3] Speech of 10th April 1905.

Clearly these naval and military works should have been financed out of revenue and not out of borrowing, and Mr. Asquith announced in 1906 his intention of closing what he described as " a most unhappy chapter in the history of our national finance." He pointed out that the system suffered from three vices : (i) It tended " to confuse the distinction between capital and revenue charges." (ii) It encouraged in spending departments " crude, precipitate and wasteful experiments." (iii) It withdrew " large items of annual expenditure from effective Parliamentary supervision." The total amount of capital liabilities which had been created amounted to £51,750,000, of which £6,027,000 had been paid off, and there still remained outstanding £45,770,000.[1] £6,500,000 were indeed to be raised under the same system during the current year, but thenceforward fresh military and naval works were to be paid for out of revenue.[2]

Secondly, the problem of the floating debt was clearly recognized. Mr. Asquith believed that there was an urgent necessity for reducing it, partly in order to provide against a sudden emergency, partly because while it remained unreduced it meant that the Government would be withdrawing loanable funds otherwise available for industrial and commercial purposes.

Lastly, the expiry of the old terminable annuities set up in 1883—the converted annuity of £684,000 and the Chancery annuity of £2,324,516—allowed a more reasonable attitude to be adopted towards the machinery of debt redemption. Mr. Asquith announced that he did not intend to set up any fresh annuities to replace those which had expired, and he thereby enabled funds available for debt redemption to be applied in such a manner as would be most profitable to the State.[3]

---

[1] These liabilities had increased in the ten years since 1896 by over £40,000,000 ; meanwhile the dead-weight debt had increased by less than £100,000,000. Cf. Budget Speech, 30th April 1906.

[2] A big increase in other capital liabilities took place, however, in 1912–14 through the purchase of the telephone system, for which £7,380,000 eighteen-year Exchequer Bonds were issued.

[3] " As long as the fixed charge is not encroached on or enlarged, it makes no real difference if the balance, after paying interest and cost of management, is applied to the reduction of debt, whether it

In 1907 a further £1,500,000 was added to the new sinking fund, making the fixed debt charge £29,500,000. This addition was not, however, as meritorious as it might appear at first sight, since, as Mr. Asquith pointed out, the £1,500,000 surplus was retained because it would be required in the following year to finance the old-age pension proposals of the Government. Thus in the following year the fixed charge was reduced to £28,000,000, and it was hinted that it would not be maintained at this level in the future. Mr. Asquith, who had now become Prime Minister, stated that the unprecedentedly large amount of £18,030,000 of debt had been redeemed during the preceding year and that the debt had been reduced to the level at which it stood in 1889. Placing himself for the moment in the position of his successor, Mr. Lloyd George, he felt that he would not be "justified in asking the taxpayers of the country to continue to pay £14,000,000 or £15,000,000 a year for further reductions of debt."

During the five years which preceded the outbreak of the Great War the policy of redemption was not pursued with the steadiness by which it had been characterized since 1905. The debt charge was reduced to £24,500,000 in 1909 and to £23,500,000 in 1914. The surpluses, which in some years were unusually large, were in part diverted from debt redemption to the newly constituted Development Fund and to expenditure on Sanatoria and on Colonial development. It was indeed urged that in spite of the reduction of the fixed charge large sums were still available for the reduction of the debt. Moreover, it could be shown that the burden of the debt, whether measured in proportion to population or to the capital of the community, was steadily declining. The Government could point with some pride to the fact that since it came into power £104,000,000 of debt had been redeemed.[1]

---

passes through the devious channel of Terminable Annuities or whether it goes straight to the new Sinking Fund." (Speech of 30th April 1906.)

[1] The old argument about the proportions of debt held respectively by the public and by the State itself was also put forward. Mr. Montagu asserted that the State held on 31st March 1913, 35 per cent. of the dead-weight debt as opposed to 28 per cent. in 1900 and 34 per cent. in 1899.

Undoubtedly the real difficulty in the way of maintaining the fixed charge was the growth of expenditure on armaments and on social reform. Mr. Lloyd George practically admitted this fact when he declared in 1914 : " We are not justified in imposing fresh taxation to keep up this unprecedented rate of liquidating our debts." Fresh taxation had in fact been imposed, but it was raised for more immediately urgent purposes, the financing of naval expenditure, old-age pensions and national insurance.

Nevertheless, however inadequate financial policy may have been, the debt itself occupied during this period a good deal of attention. Public opinion was in fact concerned with two interrelated problems, the fall in Consols which had been going on since the end of the last century, and the relative importance of the old and new sinking funds.

Between 1903 and 1913 the prices of Consols had varied as follows :

	Highest	Lowest		Highest	Lowest
1903 . . .	$98\frac{5}{8}$	$96\frac{7}{8}$	1909 . . .	86	$82\frac{1}{16}$
1904 . . .	$91\frac{1}{4}$	85	1910 . . .	$83\frac{1}{4}$	$78\frac{3}{8}$
1905 . . .	$91\frac{3}{16}$	$87\frac{1}{2}$	1911 . . .	$82\frac{1}{8}$	$76\frac{3}{8}$
1906 . . .	91	$85\frac{9}{16}$	1912 . . .	$79\frac{3}{16}$	$72\frac{1}{2}$
1907 . . .	$87\frac{3}{8}$	$80\frac{3}{4}$	1913 . . .	$75\frac{5}{8}$	71
1908 . . .	$88\frac{3}{8}$	$83\frac{5}{16}$			

This fall in price, though considerable, might superficially be ascribed to a rise in the rate of interest. A large part of the fall was undoubtedly to be associated with a change in the rate of interest, but this explanation alone would have been inadequate. It was generally agreed that the fall in Consols had been more pronounced than the fall in other fixed-interest securities.[1] Some cause or group of causes had therefore to

---

[1] *e.g.* Foreign Government securities and municipal stocks : railway debentures had, however, suffered a bigger depreciation. The *Economist* (Article, " Thoughts on Consols," 27th July 1912) gave the following table :

	1st Jan. 1906	End of June 1911	End of June 1912	24th July 1912	Fall since 1906
$2\frac{1}{2}$ per cent. Consols .	$89\frac{3}{8}$	$79\frac{1}{8}$	$76\frac{3}{8}$	$73\frac{5}{8}$	$15\frac{3}{4}$
3 per cent. *Rentes* .	99	95	$93\frac{1}{2}$	$91\frac{1}{2}$	$7\frac{1}{2}$
German 3 per cents. (1891–3) . . .	88	83	79	79	9
Austrian 4 per cent. *Rentes* . . .	99	99	$95\frac{1}{2}$	96	3

be found which would explain the relatively greater depreciation of the principal British Government stock.

It was not difficult for political opponents to urge that the chief cause of this depreciation lay in the Government's financial policy. They pointed to its departure from the old Liberal motto of retrenchment and to its free use of direct taxation in the shape of the super-tax and the death duties. They came, perhaps, closer to the root of the problem when they criticized the reduction of the new sinking fund, the maintenance of which at its old level was necessary, they argued, in order to prevent the depreciation of Consols.

The Government was, however, prepared with a reasoned defence. Prior even to the reduction of the fixed charge Mr. Asquith had shown that the position had been influenced by a variety of factors. He mentioned the volume of fresh issues, the extension of the scope of trustee securities and the excessive borrowing of municipalities. He also referred to the Irish Land Stock[1] which had been created by the Conservative Government in 1903 in connection with an Irish land-purchase scheme. The issue of these new securities had widened the scope for investment, particularly for trustee investment, and Consols had naturally suffered. Subsequently Mr. Lloyd George argued that, whereas in 1888 there were £300,000,000 of trustee investments outside the range of Government securities, there were now £1,800,000,000 of such investments apart from Consols.[2]

A great deal was said about the absorption of capital by new countries and about the rise in the standard of living which had led people to demand a return of 3½ per cent. where formerly they had been content with 3 per cent. or less. But all this was beside the point since it did not explain the fact, admitted by every one, of the relatively greater depreciation of Consols as compared with other fixed-interest securities.[3] Probably the explanation was to be found mainly in the widening of the scope of trustee investments, though some influence may be ascribed to the adoption of a less effective sinking fund policy.[1]

---

[1] Guaranteed 2¾ per cent. stock irredeemable for thirty years.

[2] Cf. *Economist*, 10th February 1912, "Consols and the Bankers."

[3] Cf. *Economist*, 29th October 1910: "At this week's prices Consols have been yielding more than French *rentes*."

The fall in Consols led to something more than a search for explanations. A severe loss had been sustained by investors in this security, particularly banks and insurance companies, and the air was full of proposals for remedying the situation. Some wanted to reconvert the 2½ per cents. back again into a 3 per cent. stock, though they offered no reason why this operation should raise prices more than proportionately. Sir Edward Holden approved the plan of removing Consols from the scope of the income tax, a plan which represented nothing more than a piece of favouritism and would have sacrificed a large amount of revenue.

There was more soundness in the proposal to extend the market for Consols by issuing them in such a form and in such denominations as would make it possible for the small investor to take them up.[2] In France bonds were issued which were suitable for the small investor, and there seemed to be no reason why the British Government should not follow this example and sell Consols "like stamps across the counters of Post Offices." This suggestion remained, however, inoperative until the financial necessities of the Great War revived it.

The problem of the sinking funds was by no means new. But it was now presented with a clearness which had been lacking in the past. Mr. Asquith's refusal to replace the Chancery annuity and the converted annuity in 1906 had laid to rest the Victorian dogma that redemption of debt was to be sought in the direction of the creation of terminable annuities. It had become generally recognized that with a fixed debt charge the creation of such annuities added nothing to the provision for the repayment of debt, and that they represented nothing more than an unnecessary, and at times inconvenient, piece of financial machinery. Emphasis had therefore to be placed upon the old and new sinking funds, that is upon budget surpluses on the one hand and upon the fixed debt charge on the other. What were the respective merits of these rival methods of debt repayment ?

---

[1] Cf. *Consols and the Sinking Funds*, by F. J. Barthorpe. Barthorpe also pointed out that in some years only a small proportion of the sinking funds had gone to the purchase of Consols, by far the greater part being devoted to the redemption of the floating debt.

[2] Cf. *Economist*, 16th December 1911, "The Consol Market."

Mr. Lloyd George's financial policy forced this question into consideration. Although he had reduced the fixed charge he was still able to redeem debt, not only out of what he had left in the new sinking fund but also out of the budget surpluses which were realized. These surpluses were, however, extremely variable. They fluctuated between the largest sum ever yet encountered and something less than two hundred thousand pounds. They were as follows :

	£		£
1909–10 1910–11	5,606,766 [1]	1912–13	180,069
1911–12	6,545,186	1913–14	749,929

Moreover, a large part of the surpluses was diverted from repayment of debt.[2] In 1909 Mr. Lloyd George proposed that " all these unanticipated accretions and economies shall in future pass into the Development Fund," and thereby laid himself open to the objection that he would be tempted to overestimate expenditure in order to get a surplus which would be devoted to some form of popular expenditure. Ultimately he abandoned this position, but of the realized surplus of £5,606,766 for the two years 1909–10 and 1910–11 only £2,356,766 was allowed to go to repayment of debt, the remainder being diverted to the Development Fund, to expenditure on Sanatoria and to a loan for the East African Protectorate. In the following year Mr. Lloyd George proposed to devote the whole of his large surplus to strengthening Exchequer Balances, thereby holding it in reserve against unforeseen expenditure which might be incurred either on the Navy or in connection with the Coal Strike. This surplus, he argued, had arisen through under-spending in the Admiralty, and it was therefore justifiable to carry it forward to the following financial year.[3]

---

[1] Owing to the holding up of the 1909 budget the results of the financial years 1909–10 and 1910–11 were taken together.

[2] Mr. Asquith had diverted £600,000 in 1908 to expenditure on new public offices.

[3] He quoted in defence a letter of Sir William Harcourt, who, referring to his political opponents, had written in 1896 : " I should not be

Fortunately this proposal was not carried out and £5,000,000 of the surplus was devoted to repayment.[1] It would have been highly undesirable, as was pointed out at the time, to have abandoned the traditional arrangement under which the Finance Accounts were closed at the end of the year and any unexpended balance had to be given up to debt repayment. If the Chancellor had had his way he would have adopted a principle which would have led to overestimates of expenditure by the several departments. Bad though the alternative would have been, it would have been better to have adopted the suggestion of a member of the Opposition[2] and to have raised a naval loan by the flotation of Exchequer Bonds when the need arose.

This juggling with the old sinking fund naturally suggested that the whole weight of debt repayment ought to fall upon the new sinking fund, and that the Chancellor had given additional grounds for the criticism which had been levelled against his reduction of the fixed charge. It was argued that "the Old Sinking Fund was a broken reed on which to rely for any real saving at any time. The great instrument for the payment of Debt has been the New Sinking Fund."[3] Sir Leo Chiozza Money pointed out that the ideal budget had no old sinking fund. Mr. Mitchell Thompson declared that "if you get a large accretion under the Old Sinking Fund it is much more likely to mean bad budgeting," and swept aside the claims of the Government by showing that they had been enabled to pay off debt simply by the accident of good trade swelling the budget surpluses.

The use of the budget surplus as a means of debt redemption is, as has been seen, thoroughly inadequate under normal conditions. Considerable progress cannot be made towards a reduction of the debt unless some fixed method of redemption is established. The difficulties about the surplus are twofold. In the first place, it may reasonably be held that to allow for a considerable surplus is bad budgeting. If,

---

much disinclined to make them a present of the Old Sinking Fund for this single year, as twelve millions is more than we can fairly demand should be devoted to Debt in one year." (Speech of 9th April 1912.)

[1] £1,500,000 went, however, to strengthen Exchequer Balances.

[2] Mr. C. T. Mills: speech of 9th April 1912.

[3] Speech of Mr. Russell Rea, 29th April 1912.

however, a surplus is budgeted for it is likely to be swallowed up by supplementary estimates, so that nothing is available for debt redemption at the end of the year. Secondly, a realized surplus is not secure from a raid by the Chancellor of the Exchequer. It was clearly by no means unusual prior to the war for the old sinking fund to be diverted either in whole or in part to expenditure on development schemes, public works and public offices. Nor was this policy wholly unjustified. These public works and public offices ought strictly to have been paid for out of revenue, but in fact the outlay was normally met by loans raised on terminable annuities. It was therefore not unnatural that a Chancellor who found himself unexpectedly in possession of a large surplus should decide to apply it to purposes for which it was regarded as quite normal to borrow.

Nevertheless, in spite of these changes considerable sums had been applied since the close of the South African War to the repayment of debt. The following table shows (*a*) the aggregate sums applied,[1] (*b*) the sums applied out of the fixed debt charge :

	(*a*) £	(*b*) £
1902–03	6,008,913	5,750,191
1903–04	9,908,115	6,509,932
1904–05	9,720,843	7,441,020
1905–06	10,266,060	8,789,663
1906–07	13,839,274	9,620,615
1907–08	16,660,302	10,909,266
1908–09	13,206,068	9,988,954
1909–10	4,097,264	3,531,419
1910–11	7,282,300	6,639,648
1911–12	9,816,402	7,045,018
1912–13	12,724,020	7,279,233
1913–14	8,677,741	7,605,880

Meanwhile the dead-weight debt had fallen from £770,778,762 in 1903 to £743,219,977 in 1906 and £649,770,091 in 1914.[2]

There was thus a considerable volume of support for the view that enough had been done in the way of redemption and that the time had come, if not to call a halt, at any rate to slacken the rate at which debt was being repaid. This view was accepted by Mr. Lloyd George in his Budget of 1914, and the fixed charge was accordingly reduced. Orthodox opinion, however, was influenced by the fall of Consols and favoured the maintenance of the (new) sinking fund at a high level. Apart from any question of the losses suffered by the holders of Consols or of considerations affecting British credit the Government, it was argued, ought to recognize that it was sound policy to buy up Consols while they were cheap. The time was, in fact, eminently suitable for purchase of debt on a large scale.

---

[1] Including both sinking funds, miscellaneous receipts and sums taken out of Exchequer Balances.

[2] The Gross Liabilities at these dates amounted to £798,349,190 ; £788,990,187 ; £706,154,110.

In the light of the magnitude of post-war debt problems the difference between these two views necessarily appears insignificant. The reduction of the debt by a few more millions in the years immediately preceding the war would have lightened our present burden by little more perhaps than one-five-hundredth. The fixed debt charge of 1914 was hardly more than one-fifteenth of the fixed debt charge of 1929. The small proportion which budget surpluses[1] are likely to bear to the aggregate debt has put out of sight the old controversy as to the relative importance of the old and the new sinking funds. Nor has there been simply a change of magnitudes; the fundamental factors in the situation have altered. Prior to the war the fall in the value of money was bringing about a steady diminution in the burden of the debt measured in terms of goods and services. On the other hand, there was a rising rate of interest and this fact, coupled with the existence of a nominal rate of 2½ per cent. on Consols, made it improbable that any further savings could be secured by conversion. The situation is now completely reversed. Falling prices have considerably increased the real burden of the debt while a falling rate of interest suggests the possibility of effecting in the near future a saving in the annual charge on that part of the debt which has been contracted at a rate of 5 per cent. (nominal). Thus a study of the pre-war period offers little help towards the solution of present problems. If a parallel is required for the financial problems of 1920–30 it must be sought, as is indeed generally recognized, in the period which followed the Napoleonic Wars.

[1] The large surpluses of 1921–4 were quite abnormal.

CHAPTER XIII

WAR AND POST-WAR BORROWINGS

The Great War admittedly produced vast changes in the National Debt and introduced financial problems of an entirely new order. It would, however, be a mistake to suppose that the nation is now confronted with a situation to which there is no parallel in its own history. Such evidence as has been brought forward seems to show, for example, that the burden of the internal debt measured in relation to the national income is not greater now than it was at the close of the Napoleonic Wars.[1] The methods by which that burden can be lightened are no different from those which have been put forward in the past—conversions, sinking funds, a levy on accumulated wealth.

The really novel elements which have arisen have been associated with the methods by which the war was financed. Thus, in contrast to the traditional policy of raising money by the issue of Consols, Government borrowed during the Great War by the creation of loans bearing varying rates of interest, but at the same time requiring to be redeemed at par by a fixed date. Secondly, the policy of continuous borrowing was introduced, or, in other words, the raising of money by the continuous issue of a certain type of security. Hitherto the loan had been a financial operation limited in point of time and terminated at a definite date. Thirdly, an attempt was made to reach the small investor by the issue of securities of low denominations. Fourthly, free use was made of the instrument of currency inflation for the purpose of financing the war. The currency which was employed was a State note issue, which thus made its appearance for the first time in British financial history. Lastly, the British Government borrowed directly from certain foreign

---

[1] Cf. Colwyn Report on National Debt and Taxation, §§ 676–9; *infra*, p. 282.

Governments, of which undoubtedly the most important was the Government of the United States. The country has thus become burdened with an external debt which, under the least favourable conditions, will not be paid off until 1984.

Borrowing was carried on by the creation of long-term debt, short-term debt and floating debt.[1] These types are indeed not clearly marked off and debt tends to pass in its progress towards maturity from one category to another. Long-term debt might be taken to include obligations which mature in a period extending from ten years upwards. Short-term debt may represent all debt maturing in less than ten years and in upwards of one year. Under the head of floating debt may be placed debt which must be repaid within a year. These types would correspond nearly enough to the distinctions between (i) War Loans, (ii) Exchequer, War and Treasury Bonds and (iii) Treasury Bills and Ways and Means Advances. A classification of this sort is useful and necessary, since the distinctions are not simply temporal; the terms of borrowing vary considerably for the different types of debt.

The financial period 1914–19 may be regarded as one in which there was a steady stream of borrowing of the third type interspersed with five War Loans which drew on fresh sources but were largely intended to drain off portions of the stream which from time to time became dangerously swollen. Alongside of this stream there must also be placed another which started in the third year of the war and represented a more permanent form of borrowing in the shape of National War Bonds. A picture of this sort is necessarily incomplete in detail, but it may serve to show how predominant were those methods of borrowing which yielded a steady and continuous flow of funds and how fundamental, therefore, was the use of floating and short-term debt in the financing of the war.[2] Plainly, a modern war which involves a vast day-to-day expenditure cannot be financed, as wars used largely to be, by the creation at periodic intervals of funded debt.

---

[1] The old distinction between funded and floating debt has, as Dr. Dalton points out (*Public Finance*, 5th Edit., pp. 237–9), become inapplicable. Three categories of debt are really required to deal with the Debt as it stands to-day.

[2] "The outstanding feature of British war finance from a practical standpoint was the remarkable success of the Treasury Bill." (H. Grady, *British War Finance*, 1914–19, p. 149.)

By the time that a supplementary Budget was produced in 1915 £90,000,000 had already been borrowed for war purposes on Treasury Bills. Meanwhile a very great increase in expenditure over the original Budget estimates was to be expected for the remainder of the financial year. How was this expenditure to be met? Mr. Lloyd George's solution can hardly be described as courageous. He proposed to increase taxation by £15,500,000 through a doubling of the rates of income tax and super-tax for the remaining four months of the year: and to reduce the sinking fund by £2,750,000.[1] This still left him, however, with a deficiency of £321,321,000 which was to be met by a loan. Mr. Lloyd George announced that the Government had decided "to raise a sum of money which will enable us to carry the War through without a further appeal to the public up to the month of July next year."

The War Loan took the form of an issue of 3½ per cent. stock at 95, the stock to be redeemed by the Government at par on 1st March 1928 but subject to redemption after three months' notice any time between 1st March 1925 and 1st March 1928. The total amount of the loan was fixed at £350,000,000.[2] The rate of interest, allowing for redemption at par in 1928, would be exactly 4 per cent. Mr. Lloyd George declared that it would be impossible to float a loan below that rate, and, while admitting his own preference for an issue at par, pointed out that he had had to take the opinion of the City into consideration. That opinion was definitely in favour of an issue of stock below par redeemable at a comparatively early date. No amounts of stock or bonds below £100 were to be issued, on the ground that such procedure would withdraw money from the Savings Banks on which the Government was already paying a lower rate of interest. It was far better, so Mr. Lloyd George argued, to get the support of the banks than to appeal to the small investor. Finally the Bank of England had agreed to make advances against the deposit of War stock or bonds of amounts equal to the issue price of the stock or bonds deposited, without margin, at a rate of 1 per cent. below current Bank Rate.

---

[1] This meant, in fact, a suspension of the whole Sinking Fund except (*a*) £1,000,000 required for the redemption of Allotment Bonds under Mr. Chamberlain's arrangement of 1905, (*b*) the Terminable Annuities.

[2] £100,000,000 of this loan were placed firm.

The loan was highly successful: it was oversubscribed and there was a surprisingly large number of small applicants.[1] The results were certainly regarded as extremely satisfactory in view of the terms which had been offered, although there was some criticism of the offer made by the Bank. "Mr. Lloyd George's huge loan," said the *Economist*, "was intended to appeal to rich men and bankers, and it is an amazing proof of London's resources that it should have been subscribed when the rate of interest was so unattractive."[2]

So far as the stream of the floating debt was concerned, conditions at this time tended to be extremely favourable to the Government. With the outbreak of war the discount market had collapsed and money could be raised very cheaply by the issue of Treasury Bills.[3] Trouble did not occur in this quarter until, after a rise of money rates in New York in 1916, rates were raised here with a view to retaining foreign balances in London.

In his second war Budget of May 1915 Mr. Lloyd George failed, as has been generally recognized, to impose taxation on a scale anything like adequate to the growing needs of the war.[4] An important opportunity was thus missed and it was left for his successor, Mr. Reginald McKenna, to raise existing rates of taxation and to impose new taxes over a

---

[1] Cf. Mr. Lloyd George's speech, 27th November 1914.

[2] *Economist*, 21st November 1914.

[3] Market rates for three months' bank bills were as follows:

1914	26th November . .	$2\frac{3}{4}$	1915	19th February . .	$1\frac{7}{16}$
	12th December . .	$2\frac{7}{8}$		23rd March . . .	$2\frac{1}{4}$
1915	25th January . . .	$1\frac{3}{4}$		22nd April . . .	$2\frac{11}{16}$

[4] Mr. Lloyd George in his Budget speech declared that the State must primarily depend upon the savings of the community. He estimated that in time of peace these savings amounted to 300–400 millions and thought that in time of war when income was higher they ought to be doubled.

fairly wide field. Whatever views may be held as to the financing of the later stages of the war, the financial policy of 1914–15 provides a firm ground for those who argue that an insufficient proportion of the war costs was met out of taxation.

A second War Loan was floated in June 1915 under the auspices of Mr. McKenna. This loan was issued at par and bore interest at 4½ per cent.; the State would have a right to repay at par in 1925 or at any subsequent date and would be bound to repay at par by 1945. The amount of the loan was not limited. Mr. McKenna defended the rate which he was offering by pointing out that the 1914 loan, with allowance for interest and redemption, was yielding 4½ per cent. and that it was standing at a discount. He urged the necessity of arranging a long-term loan and pointed out the disadvantages associated with the use of Treasury Bills on an extensive scale.[1] These were, first, the difficulties connected with their rapid maturity and, secondly, the undesirability of borrowing "bankers' money" as opposed to "public money."

Among the unique features of this loan were the terms of conversion which it contained. In the first place rights of converting Consols and "old war loan" into new loan were granted, the only condition being the acquisition of a proportionate holding in the new loan. Consols then stood, under public regulations as to minimum prices, at 66½: Mr. McKenna announced that holdings might be converted at the rate of £75 of Consols for £50 of War Loan, Consols being thus taken at 66⅔.[2] As for the "old war loan"[3] the stock was to be taken at the price of issue; thus £100 of this stock plus a cash payment of £5 would purchase £100 of new loan. Whether there was any justification for this policy is doubtful. The defence put forward was that the issue of the new loan would send down the prices of the old securities and that

---

[1] £235,000,000 had been raised on Treasury Bills up to the end of the Financial Year.

[2] Sir F. Banbury put the cost of conversion of Consols at £3,500,000 per annum; cf. speech, 21st June 1915. Holders of 2¾ per cent. annuities (1884) were allowed to convert at the rate of £67 for £50, and holders of 2½ per cent. annuities (1853) at the rate of £78 for £50.

[3] The price of this loan, which was not subject to any regulation, was 93¾.

"this country will never leave its creditors in the lurch."[1] But the principle thus enunciated was too sweeping even for Mr. McKenna and he did not propose to apply it to holders of Irish Land Stock. Clearly public creditors must take their chances, and no adequate justification can be given for a bolstering up by the State of depreciating public securities.

Conversion privileges were also given to holders of the new loan. They were to receive a "covenanted benefit" in the shape of an undertaking that in any new issue of a long-term loan their stock would be taken for cash at par. This provision was highly extravagant and was severely criticized in some quarters. Sir F. Banbury declared that if the loan was a failure it would not be fair to say to the taxpayer "you must recompense these people because it has been a failure." The concession was not "business." Mr. McKenna, indeed, admitted that the terms were "generous," but his policy was undoubtedly coloured by his optimistic views as to the course of the war. He evidently felt that a termination of hostilities would soon be reached and believed that there would be small likelihood of his concession ever becoming operative. To those, however, who did not share his views he wished to make it plain that they would gain nothing by withholding their savings. "The argument for waiting is absolutely gone."

In this loan an attempt was made for the first time to reach the small investor. For the stock itself the minimum subscription was fixed at £100. But provision was made for the sale through Post Offices of Bonds for £5 and £25. War Loan vouchers for five shillings and multiples of five shillings were also to be issued through Post Offices, Trade Unions, and Friendly Societies.

The amounts of stock created on account of this loan were as follows:

	£
Cash Subscriptions	587,196,310
Conversion of 3½ per cent. War Loan . .	137,468,426
Conversion of Funded Debt	176,166,847
Total	£900,831,583

---

[1] Other points made were (*a*) that the attractive terms would induce people to purchase war loan in order to secure the right to convert, and (*b*) that a reduction in the capital of the debt would be brought about through the conversion of Consols.

It is surprising that larger conversions of debt did not take place. The amounts of Funded Debt so converted and the amounts outstanding were as follows :[1]

	Converted into 4½ per cent. War Loan £	Outstanding (31st March 1916) £
Consols	255,200,000[2]	280,500,000
2½ per cent. Annuities .	8,200,000	21,600,000
2¾ per cent. Annuities .	1,100,000	2,700,000

Some allowance must, however, be made for stock held by the National Debt Commissioners and otherwise locked up ; while in the case of the first War Loan the advantage of an early redemption which it afforded may have deterred holders from making use of the rights of conversion now offered to them.

The "covenanted benefit" granted in the terms of this loan was an obstacle which seriously hampered financial operations for over a year. A considerable period elapsed before another long-term loan was raised, and it was believed that the failure to introduce such a loan was due to the conversion rights which had been granted to the holders of the 1915 loan. Doubts even arose as to whether the option which these holders had received would actually be fulfilled.

There was thus a steady growth of these forms of debt to which conversion rights had not been attached. In March 1915 £50,000,000 of 3 per cent. five-year Exchequer Bonds had been offered for tender. In December 1915 a new method of issuing these Bonds was introduced, and the Treasury announced that 5 per cent. Bonds repayable at par would be sold daily to persons who chose to apply for them. Thus the system of continuous borrowing was inaugurated in the form in which it became extensively used in the latter part of the war.[3]

Continuous borrowing on Exchequer Bonds was really only an extension to the short-term debt of the principles which had since April 1915 governed the management of the floating debt. In April 1915 the Treasury announced its policy of placing Treasury Bills on sale at fixed rates,[1] a policy which was continued down to the introduction of the third War Loan of January 1917 and was renewed, after a brief reversion to the old system of tender, until April 1921. The rates at which Treasury Bills were in current terminology "on tap" were as follows :

---

[1] Statement of Mr. McKenna, 15th May 1916.

[2] Including £35,795,000 formerly held by Post Office and Trustee Savings Banks Funds.

[3] In June 1916 this issue was discontinued and was replaced by the issue under similar conditions of two series of 5 per cent. Exchequer Bonds repayable in October 1919 and October 1921 respectively.

	3 months' Bills	6 months' Bills	9 months' Bills	12 months' Bills
1915				
14th April	2¾	3⅝	3¾	3¾
9th August	4½	4½	4½	4½
27th October	4¾	4⅞	5	5
12th November	5	5	5	5
1916				
24th March	4½	4¾	4¾	5
16th June	5	5	5	5
14th July	5½	5¾	—	6
27th September	5½	5½	—	5½

To some extent changes in these fixed rates represent the attempt of the Treasury to apportion the stream of savings to bonds and bills respectively. But it would be a mistake to suppose that there was a definite and precise relationship between the rates at which Treasury Bills were "on tap" and the rates payable on the Exchequer Bonds which were continuously offered for sale. The constitution of the market for five-year bonds is different from that of the market for short-dated bills.[2] Money seeking investments with a longer life than one year would not enter the Treasury Bill market, while the Treasury through the control which it had established over capital issues since the beginning of 1915 could drive this money into Exchequer Bonds.

In 1916 the volume of Treasury Bills underwent a very considerable increase, as the following table shows :

---

[1] Cf. Treasury Minute, 13th April 1915.

[2] The difference is less marked in the case of "yearling" bills, where to some extent the two markets overlap. Such adjustment as occurred therefore tended to show itself in a suspension of the sale of "yearling" bills.

Treasury Bills Outstanding

1916	£	1916	£
4th March . . .	443,218,000	23rd September .	1,003,552,000
22nd April . . .	604,935,000	28th November .	1,124,474,000
10th June . . .	701,061,000	9th December .	1,148,471,000
26th August . .	908,659,000	22nd December .	1,057,094,000

Monetary policy undoubtedly played a large part in the management of the floating debt. The maintenance of a large volume of Treasury Bills in existence mopped up the funds of the money market and thereby assisted the Bank of England in its control of money rates. This control the Bank naturally wished to strengthen in the summer of 1916 when a rise in rates in the United States led it to raise its own rate to 6 per cent.[1] There was, moreover, a more direct relationship between the Treasury Bill policy and the American exchange than that which was produced through the influence of that policy upon money rates. The Treasury Bill offered a return free of income tax and thus possessed a special attraction for the foreign investor.[2]

But the Government's policy with regard to the floating debt obviously contained serious dangers and a good deal of criticism was expressed in the summer of 1916. On 10th August Sir C. Henry asserted that there were £850,000,000 Treasury Bills outstanding and described the current financial policy as one of "opportunism, temporizing." The Chancellor was now putting the rate for yearling bills at 6 per cent.[3] and it was therefore not surprising that there was a keen demand for them. He had procrastinated too long. "The only course open to him now in order to have this enormous amount of Treasury Bills and other short-date securities funded will be a forced loan."

Mr. McKenna replied that he did not adopt the policy: he found it in existence.[4] There were, he pointed out, three categories of Treasury Bills: short-dated with a maturity of three months; middling with a maturity of six or nine months; and long-dated with a maturity of a year. Since the 1st April 1916, the number of short-dated bills outstanding had actually been reduced by £46,000,000. Middling bills had increased by £122,000,000 and yearling bills by £199,000,000. But the growth in the volume of middling and yearling bills need not cause alarm: they were sought by the genuine investor who, owing to their immunity from capital depreciation, probably preferred them to any other form of investment. Mr. McKenna held that the conditions which determined the issue of a loan were whether "the state of Money Market at any given moment discloses a condition of inflation, and if credits are being heaped up which do not really and truly represent real money."[1] Apparently he did not think that these conditions were fulfilled. At the same time he regarded the fact that income tax was not paid on Treasury Bills as a great advantage. "You never can borrow abroad on a security on which the holder pays Income Tax."

---

[1] 13th July 1916.

[2] From 24th August 1917, after the entry of America into the war, $15 millions of 90-day Treasury Bills were placed weekly on the American market.

[3] Equivalent to a yield of $6\frac{3}{8}$ per cent.

[4] "I found that hundreds of millions have been borrowed by this method of issuing Treasury Bills on tap before I ever went to the Treasury." (Speech of 10th August 1916.) This statement hardly seems to fit the facts.

These arguments betray a fatal inability to grapple with the problem of the floating debt. It is difficult to know what test the Chancellor would have applied in order to discover whether a condition of inflation prevailed in the money market. The only sound criterion for ascertaining whether governmental borrowing depended upon genuine savings or upon savings extorted by credit inflation should have been sought in the index of the general price level. But if an examination of the price level and of the factors affecting it had been carried out the conclusion could not long have been avoided that the root of the problem lay not in the money market but in the policy of the Treasury. In short, the inflation which was taking place during these years was not an inflation originating in the money market but an inflation of currency and of credit arising out of short-term borrowing on Treasury Bills and Ways and Means Advances.

The attitude of the investor also appears to have been misunderstood. It was pointed out that owing to the Government's reliance on short-dated securities they "fail to tap the money of these investors who take the view that long-dated or perpetual securities are now a better purchase and so buy Home Railway debentures and preference stocks or colonial stocks with a far-off date of redemption." [1] The City strongly opposed the Treasury Bill policy and would have preferred a long-term loan.[2] The finance of this period was thus based upon a misunderstanding of the position, a misunderstanding which was all the more serious, since it involved borrowing at the absurdly high rate of 6 per cent.

---

[1] Statement, 10th August 1916.

In October a slight modification of this policy was introduced. An issue of 6 per cent. Exchequer Bonds repayable at par in February 1920 was brought out, and the rate on yearling bills was accordingly lowered to 5½ per cent. But this change evoked even more criticism than had the old policy. The rate, it was declared, was extravagant; the issue of the bonds had caused a lowering of the prices of securities. Bonds, it was argued, were an unpopular form of investment and what the investor wanted was a long-term stock issued slightly below par.

The issue of these short-dated securities appeared to be still dominated by the problem of the American exchange and of American supplies. In a further debate on the subject [3] Sir C. Henry argued that out of £1,500,000,000 of short-dated securities probably £300,000,000 were held by foreigners. This, he thought, was a dangerous situation and he asked whether there were not some other means of regulating the exchange. Mr. McKenna replied that he wanted Treasury Bills to be held abroad. "If we do not raise money in the United States it means that we must cut short our supplies from the United States." So far as the issue of Exchequer Bonds went, he defended himself by saying that October or November was a bad time in which to negotiate a long-term loan. In spite of these arguments, however, it was clear that a situation in which the rate on Government borrowings was determined to a large extent by exchange conditions was decidedly unsatisfactory.[4] Much more reliance should have been placed upon the savings of the home investor who was looking for a longer dated security than a Treasury Bill or Exchequer Bond. Meanwhile it was futile to bolster up the exchange so long as an inflationary monetary policy was being pursued.

---

[1] *Economist*, 5th August 1916.

[2] *Ibid.*, 12th August 1916.

[3] 19th October 1916.

[4] The *Economist* (20th January 1917), urging differential rates for home and foreign money, declared: "It does not follow that it was right for the Government to pay home borrowers 6 per cent. on

At the end of 1916 a change of Government occurred and Mr. Bonar Law became Chancellor of the Exchequer. He at once proceeded to introduce two long-term loans, the conditions for which had apparently been prepared by his predecessor. Two issues were thus placed on the market in January 1917 : (1) A 5 per cent. loan which was bound to be redeemed by 1st June 1947, but was liable to redemption any time from 1st June 1929, onwards. This loan was offered at the price of 95 and was liable to income tax. (2) A 4 per cent. loan redeemable 1929–42. This loan was offered at par and was free of income tax. It was definitely intended that these issues should mop up the floating debt and Treasury Bills were accepted in payment for stock under discount at the rate of 5 per cent. per annum.

Certain special privileges which had not hitherto appeared were attached to these loans. First, the stocks were to be accepted at their issue prices in payment of death duties.[1] Secondly, a sinking fund was attached to each of the loans. To provide against their depreciation the Treasury undertook to set aside monthly [2] $\frac{1}{8}$ of 1 per cent. of the amount of each loan to form a fund to be devoted to purchasing stock whenever the market price fell below the issue price.

Mr. Bonar Law defended the terms on which the loan had been raised by reference to the position of money rates.[3] He argued that owing to the necessity of maintaining foreign

---

Exchequer Bonds and now 5¼ odd per cent. on a twelve–thirty year loan, because Bank Rate was put up to 6 per cent. in order to induce foreign lenders to keep and increase their balances in London."

[1] Provided that the stock (or bonds) had formed part of the estate of the deceased for not less than six months prior to the date of death.

[2] The unexpended balance of the fund was limited to £10,000,000 : when this limit was reached the monthly payments were to be suspended.

[3] Statement, 26th February 1917. At this time the prices of securities were as follows : Consols, 55¼ ; 3½ per cent. War Loan, 85½ ; 4½ per cent. War Loan, 98½.

exchange rates the value of money on the London market had been much higher than it would otherwise have been.[1] He had been told "that the rate of the Loan ought to be 6 per cent., and I was warned that it would be a failure if a lower rate was offered." He was anxious that the greater part of the loan should be subscribed directly by the public: the loan of 1915 had been a great success, but it was an open secret that out of £613,000,000 £200,000,000 had been subscribed by the banks.

Some objections were raised to the sinking funds which had been attached to the loans. It was rightly pointed out that the repayment of debt during a period of borrowing was based upon a fallacy which had been exposed one hundred years previously.[2] The funds were, however, defended on the ground that they were not really sinking funds but depreciation funds. They were intended to guard against depreciation and to exert a steadying influence upon the prices of the stocks. It was also argued subsequently that the introduction of these funds into the terms of the loans had contributed to the success of the issues.

The results of these loans form an interesting basis of comparison. The amount of 5 per cent. stock created whether for cash subscriptions or in exchange for other securities was large; the 4 per cent. tax-compounded loan was unsuccessful. The reasons for this difference are fairly clear. In the first place, the difference did not really exist for the foreign investor who might have been expected to prefer the tax-compounded loan. The dividends on the 5 per cent. loan were not liable to income tax in the case of persons resident abroad. Secondly, the home investor, in so far as he chose to speculate about future rates of income tax, probably anticipated that they would fall. These loans were regarded at the time as the last big loans of the war. At the same time there was a growing suspicion that if increased taxation were introduced it would take the form, not of a rise in the rate of income tax, but of a levy on accumulated wealth.

---

[1] In May 1917, Mr. Bonar Law was still troubled by the problem of the exchange: to keep it right "it is also necessary that the rate of money here should be distinctly higher than on any other money market in the world." (Speech of 2nd May 1917.) In 1918 differential rates for home and foreign money were adopted.

[2] Cf. speech of Mr. D. Mason (30th October 1917): "It must be self-evident that the money market is something like a cistern and if the Government with one hand withdrew from this cistern £21,000,000 representing so many buckets of water, they depress the stock, and when they purchase the loan their stock possibly rises to the same level it stood at before."

The figures for the 5 per cent. loan were naturally swollen on account of the conversions which were made, in accordance with the privileges which had been granted to them, by holders of the 1915 loan and of Exchequer Bonds.

	5 per cent. War Loan	4 per cent. War Loan
	£	£
For Cash	836,454,260	22,046,000
For Treasury Bills and War Expenditure Certificates [1]	130,205,100	612,500
Conversion of 4½ per cent. War Loan	820,112,465	23,198,910
Conversion of Exchequer Bonds .	280,446,919	6,560,840
Total	£2,067,218,744	£52,418,250

The number of subscribers was put down at 5,289,000,[2] which compared favourably both with the number of subscribers to the 1915 loan [3] and with flotations in Germany. Meanwhile the floating debt had been considerably reduced since the date at which the loan had been issued.

	Treasury Bills	Floating Debt (including Exchequer Bonds)
	£	£
12th January 1917 . .	1,053,000,000	1,562,000,000
25th February 1917 . .	718,000,000	994,000,000

The effect of the conversions of the stock of previous loans was to reduce the greater part of the long-term debt into the 5 per cent. War Loan. This change was therefore equivalent to an upward conversion of debt, and thus, although a larger annual charge was created, the annual savings in the future through any downward conversions that may take place will be on a larger scale. Although, therefore, the granting of the "covenanted benefit" in 1915 may be regarded as absurdly generous, the cost of the benefit may be to some extent offset in the future by downward conversions of the 5 per cent. War Loan.

---

[1] These Certificates, which were equivalent to two-year Treasury Bills, had been issued at fixed rates of discount between 3rd June 1916 and 1st January 1917.

[2] This, however, included 3,200,000 subscribers to War Savings Certificates.

[3] 1,100,000.

Meanwhile, since February 1916, a form of borrowing had been introduced which was intended to absorb the savings of the small investor and also helped to provide that continuous stream of funds which the Government required. War Savings Certificates [1] were offered continuously for sale, the price of a Certificate being fifteen shillings and sixpence, for which the holder received £1 at the end of five years, representing repayment with accumulated interest.[2] A special attraction of the Certificate lay in the fact that this accumulated interest was exempt from income tax. Although the proceeds from the sale of these Certificates were not at the outset large their introduction did something to remedy the failure of the British financial system to cater for the small investor. Moreover, sales increased in the later stages of the war and by 28th May 1921 total receipts from this source had amounted to £344,521,000. It is true that borrowing on any extensive scale must be mainly supported by the savings of the rich, but the experience of the war shows that a by no means inconsiderable contribution can be secured by the issue of securities which attract the small savings of the community.[3]

In the spring of 1917 the United States of America entered the war. This political change produced an alteration in the form and to some extent in the amount of Great Britain's external borrowing. Hitherto money raised in America had been borrowed under private arrangements. In October 1915 a joint Anglo-French loan of $500,000,000 had been raised with a view to supporting the exchanges, the proceeds of the loan being divided equally between the British and

---

[1] The name was changed in 1920 to National Savings Certificates.

[2] The total amount of any individual holding was limited to £500.

[3] There is, however, a good deal of overlapping: Savings Certificates would frequently be purchased by persons who otherwise would have invested their savings in war loan.

French Governments.[1] From the autumn of 1916 onwards further loans were raised:

Date	Amount	Interest	Price	Maturity
1916				
September . .	$250,000,000	5 per cent.	99	2 years
November . .	$150,000,000	5½ per cent.	99¼	3 years
	$150,000,000	5½ per cent.	98½	5 years
1917				
January . .	$100,000,000	5½ per cent.	99·52	1 year
	$150,000,000	5½ per cent.	99·07	2 years

In each case the loans were exempted from all British taxes.

The purpose of these loans was to finance the importation of food and raw materials from the United States.[2] British resources which would otherwise have had to be diverted to making exports to pay for these goods could be devoted to the production of things immediately required for the purposes of the war.

After the entry of the United States into the war the British Government borrowed directly from the Government of the United States, the rate at which it borrowed being determined by the rate at which the corresponding loans were raised in America. At the end of the war, therefore, a portion of the National Debt consisted of external debt due to the United States Government, and while Great Britain had in her turn advanced large sums to her allies, the prospect of repayment in full was in every case so remote that it seemed probable that on balance her external debt would outweigh the adjusted value of the obligations due to her.[3]

In May 1917 Mr. Bonar Law introduced his first Budget. In spite of the vast war expenditure he proposed only to increase three existing taxes—the entertainments duty, the tobacco duty and the excess profits duty. Here again, as in Mr. Lloyd George's Budget of 1915, the opportunity for meeting a larger proportion of the costs of the war out of revenue seems to have been missed. Mr. Bonar Law himself dealt with the factors involved in a comparison of loans and taxes as methods of financing the war. High taxation, he argued, "diminishes the capital that may be available at the end of the war." Yet it was equally true that an immense National Debt would constitute a heavy burden upon the country. Financial policy must therefore be so directed as to avoid as far as possible both these evils. This argument, however, seems to overemphasize the disadvantages of a policy of taxation as compared with a policy of borrowing. Government borrowing may equally be said to have diminished the real capital available at the end of the war. Taxation, on the other hand, would have been met probably to a considerable extent by a curtailment of expenditure.

---

[1] The loan was in the form of five-year 5 per cent. bonds.

[2] Loans were also raised for this purpose in the Dominions, in Japan and in the Argentine.

[3] For an account of external loans and debts, *see* pp. 282 *et seq.*

The figures which Mr. Bonar Law produced in his 1918 Budget support the conclusion that too much reliance was placed upon borrowing and too little upon taxing. He estimated that for the four financial years 1914–18 the proportions were as follows:

Proportion of Revenue to Total Expenditure . .	26·3 per cent.
Proportion of War Revenue to War Expenditure[1] .	21·7 per cent.

These proportions seem low, especially when allowance is made for the fact that the four years taken as the basis of comparison include four months of peace.

Thus the stream of borrowing widened and the floating debt, which had been reduced at the beginning of 1917 through the introduction of the 5 per cent. War Loan, again began to increase. The growth in the volume of Treasury Bills outstanding was as follows:

Date 1917	£	Date 1917	£
2nd June	569,517,000	3rd November .	991,036,000
4th August . . .	759,977,000	1st December .	1,011,583,000
1st September . .	846,141,000	22nd December .	1,057,094,000
6th October. . .	940,238,000		

Meanwhile there had been developed since October 1917 a stream of short-term borrowing which enabled the Government to finance the continuous expenditure of the war and thereby checked the expansion of the volume of outstanding Treasury Bills.[1]

---

[1] Deducting £200 millions as the revenue and expenditure of a peace year.

From 2nd October 1917 a series of National War Bonds of four different classes was offered for continuous sale at par. The classes were as follows :

(i) 5 per cent. Bonds repayable 1st October 1922 at 102 per cent.
(ii) 5 „ „ „ „ „ 1924 at 103 „
(iii) 5 „ „ „ „ „ 1927 at 105 „
(iv) 4 per cent. Bonds (income tax compounded) repayable 1st October 1927 at par.

Thus the old system of issuing periodically long-term loans and thereby mopping up quantities of floating debt was discontinued. The issue of 5-year, 7-year and 10-year War Bonds was certainly more appropriate to the financial needs of the war. Apart, however, from this sort of consideration it is clear that difficulties would have cropped up over another long-term issue in connection with the conversion rights which had been granted to holders of the 1915 War Loan.[2] Probably also the feeling that holders of earlier securities should not be " left in the lurch," as Mr. McKenna expressed it, would have led to the introduction of an all-inclusive set of conversion rights which would have been unfavourable to the State.

On 2nd April 1918 a second series of War Bonds appeared divided into the following classes : (i) Three lots of 5 per cent. Bonds repayable in 5, 7 and 10 years at 102, 103 and 105 per cent. respectively : (ii) 4 per cent. tax-compounded Bonds repayable in 10 years at par. A third series of similar Bonds came out on 1st October 1918, the only difference being that the price of issue of the 4 per cent. tax-compounded Bonds was raised from par to 101½. Finally, a fourth series was placed on the market on 1st February 1919. This series was similar to the third but for the fact that no issue of 7-year Bonds was made.

---

[1] Under the revised system of placing Treasury Bills " on tap " the fixed rates for three and six months' bills were lowered on 27th December from 4¾ to 4 per cent. No yearling bills were offered until March 1920.

[2] Holders of the 1915 War Loan and of Exchequer Bonds were entitled to convert into the longer-dated issues of War Bonds at par. The disadvantages of this course were less, however, than those which would have attended the flotation of a long-term loan.

The total issue of War Bonds up to June 1919 was £1,755,000,000, of which £1,732,000,000 had been issued for cash and £23,000,000 in exchange for other securities. From that time onwards they were replaced by another type of short-term security, the Treasury Bond, which has been one of the chief instruments of post-war finance. The War Bonds undoubtedly served a useful purpose in providing a stream of funds from 1917 onwards. The only difficulty was, as Mr. Bonar Law pointed out in May 1918, that "you cannot keep up the stream." Much effort had to be devoted to securing that the supply of money coming from this source should throughout be adequate to the financial requirements of the Government.

The fact that the Bonds were repayable within a few years and in most cases at a premium rendered them attractive to the investor who was looking out for a security which would not be liable to depreciation. Certain special privileges were also associated with them which increased their attractiveness. They were to be accepted at their nominal value by the Commissioners of Inland Revenue in payment of Death Duties and Excess Profits Duty. Holders of 5 per cent. Bonds of any of the first three series were given the right to convert into 5 per cent. War Loan at the rate of £100 of War Loan for £95 of Bonds ; holders of 4 per cent. tax-compounded Bonds might convert at par into the 4 per cent. War Loan. Moreover, holders of Bonds of any of the first three series received the right to convert at par into any future long-dated issue.

Thus during the remainder of the war reliance was placed upon the stream method of borrowing and money was raised by the continuous sale of War Bonds and War Savings Certificates. Towards the end of the war, however, a considerable increase occurred in the amount of borrowing on Ways and Means Advances which indicated a dangerous inflation of the means of payment.[1] This inflationary policy was laying up serious trouble for the future. Loans were being raised on an immense scale in depreciated money values, interest on and repayment of which must now be met in a greatly appreciated currency.

---

[1] Ways and Means Advances had grown from £192·2 millions on 31 March 1918 to £416 millions on 7th December 1918.

The close of the war thus found the country in an extremely grave financial position. The course of an inflationary monetary policy presented a difficult problem for a Chancellor of the Exchequer who wished to produce a balanced Budget. Yet without a balanced Budget it seemed impossible to curb the excesses of inflation. Nevertheless, after more than a year of further inflation, the vicious circle was broken by the imposition of a check on the monetary policy which had hitherto been pursued.

Mr. Chamberlain, who had succeeded Mr. Bonar Law as Chancellor, made no attempt to balance the Budget of 1919 in the sense of raising revenue adequate to the expenditure of the year. He estimated a deficit of £233,810,000 which would have to be covered by loans.[1] At the same time there were large amounts of maturing debt, particularly National War Bonds, for the repayment of which provision had to be made. Accordingly two long-term loans were raised : [2]

(i) An issue at the price of 80 of a 4 per cent. Funding Loan repayable 1960–90.

(ii) An issue at the price of 85 of 4 per cent. Victory Bonds repayable by annual drawings at par which will completely redeem the loan by 1976.

To each of these loans special sinking funds were attached, since the State undertook to set aside every half-year sums equal to 2¼ per cent. of the original amounts of Victory Bonds and Funding Loan, the balance after payment of interest being devoted to redemption. Moreover, special privileges were granted in the form of a right to tender these securities in payment of death duties. Tendered for this purpose Victory Bonds were to be accepted at par, Funding Loan at its issue price of 80.

Clearly these two issues were intended to appeal to different types of investor. There was a "spice of speculation" in the terms of the Victory Bond issue, since Bonds were to be redeemed at par by annual drawings. Funding Loan, on the other hand, catered for those who wanted a long-term investment, since it was not redeemable until 1960. To the State, however, the terms were decidedly and perhaps to some extent unnecessarily disadvantageous. The right to tender Victory Bonds at par in payment of death duties involved an obvious sacrifice of revenue. The irredeemability of Funding Loan before 1960 gave the subscribers a 5 per cent. return for forty years. Thus the terms of this loan, while open to the recognized objections associated with the issue of securities below par, possessed the added disadvantage of creating debt irredeemable for a considerable period and therefore incapable of being converted to a lower rate of interest. Conditions at this time were indeed unfavourable to the sale of a long-dated security on terms advantageous to the State. The prospects of depreciation through the combined influence of a rising rate of interest and unsound government finance were likely to discourage the investor, who would have preferred a security repayable at par within a fairly short period. Under these circumstances it is not surprising that the terms offered were generous, though it is probably true that they were more generous than they need have been.

---

[1] The realized deficit was £326,202,000.

[2] The prices of securities in the first week of June were as follows: Consols, 54¼ (ex dividend) ; 3½ per cent. War Loan, 88⅝ ; 5 per cent. War Loan, 94½.

The specific sinking funds provided an added attraction. Such funds may have a certain value when they are used to push up the prices of stocks in which it is intended that future issues shall be made. Apart from this consideration, however, it is clear that it is desirable that the sinking fund should be freely available for the repayment of debt in general and should not be subject to any specific allocation. The specific sinking fund may indeed be supposed to possess the advantage over other arrangements that it automatically ensures the redemption of debt. The history of the methods which have been devised for the purpose of redeeming debt ought, however, to provide a warning against any such conclusion. Moreover, post-war experience has shown that these specific sinking funds may in fact be rendered nugatory, arrangements being made to borrow the sums required to meet them.[1]

---

[1] This was done by Sir Robert Horne in his 1922 Budget; *vide* p. 273.

The results of the Victory Bond and Funding Loan issues were as follows : [1]

VICTORY BONDS

		£
For cash		287,919,088
Conversions	(*a*) of 4½ per cent. War Loan	601,212
	(*b*) of Exchequer Bonds	9,389,939
	(*c*) of National War Bonds	61,621,606
Total		£359,531,845

FUNDING LOAN

		£
For cash		288,967,799
Conversions	(*a*) of 4½ per cent. War Loan	1,037,614
	(*b*) of Exchequer Bonds	18,860,240
	(*c*) of National War Bonds	100,245,947
Total		£409,111,600

But with a large excess of expenditure over revenue there was little possibility of funding. In fact, the floating debt and the paper currency together constituted the big financial problem of 1919. Thus, although during the summer the volume of Treasury Bills was reduced, the floating debt suffered an alarming expansion in the autumn, a reduction in Ways and Means Advances being offset by an increase in outstanding Bills.[2] There was a parallel movement in the Currency Note Issue. At the end of 1919 the financial position was seriously undermined and a further inflationary development was clearly threatened.

---

[1] Direct subscription by the banks accounted for £111,000,000 of these securities (Funding Loan, £37,692,000 ; Victory Bonds, £73,351,000).

[2] The figures of the floating debt were :

1919	Treasury Bills £	Ways and Means Advances £	Total £
31st March	957·2	455·0	1,412·2
3rd May	1,000·2	479·0	1,479·2
30th June	796·0	774·0	1,570·0
2nd August	749·7	434·1	1,183·8
20th September	870·8	350·6	1,221·4
8th November	1,082·6	227·6	1,310·2
13th December	1,111·0	230·8	1,341·8

Failure to impose additional taxation[1] and to reduce expenditure was mainly responsible for this situation. If a firmer policy had been adopted a second Budget might have been introduced in the autumn in which an attempt could have been made to cover the current deficit by an increased revenue. The alternative of raising the money required by borrowing the genuine savings of the public must in any case be regarded as a *pis aller*. The development of the post-war boom had, however, placed considerable difficulties in the way of such a policy. Money rates had risen and the time was therefore unsuitable for the raising of a long-dated loan either for the purpose of obtaining revenue or for the funding of the floating debt. Various devices were, however, suggested, such as the issue of Bonds on tap or the introduction of Premium Bonds. In fact a policy of drift was pursued, and there appeared to be no check to the course of lavish expenditure financed by the flotation of Treasury Bills.

A rise of Bank Rate from 5 to 6 per cent. on 6th November and the issue in December of the final Report of the Cunliffe Committee on Currency and Foreign Exchanges foreshadowed a change in monetary policy. The report was followed by the fixation by Treasury Minute of 31st December 1919 of a legal maximum fiduciary issue of Currency Notes. A definite check was thus imposed upon the inflation which had been so marked during the preceding two years.

Something more was required, however, than the mere issue by the Treasury of a self-denying ordinance on the subject of monetary policy. In the Budget of 1920 Mr. Chamberlain announced that borrowing would be terminated and that fresh taxation would be imposed, and estimated that with the assistance of receipts derived from the sales of war stores a surplus of £234,000,000 would be secured. The tide was thus stemmed.

Throughout 1920, however, the floating debt remained a formidable problem. The volume of outstanding Treasury Bills, amounting to over £1,000 millions, was a serious danger, since by allowing these bills to run off the public could drive the Government to have recourse to further Ways and Means

---

[1] It may be noticed that in the Budget of 1919 Excess Profits Duty was reduced from 80 to 40 per cent.

Advances which would bring about a renewal of inflation. Actually the situation appears to have been saved by a reformed monetary policy which was expressed in a limitation on the fiduciary note issue and the imposition of a 7 per cent. Bank Rate. Prices started falling and the post-war boom showed signs of collapse.

Meanwhile a sounder financial policy was also exerting its influence upon the situation. Revenue exceeded expenditure for the first time since 1914 and the realized surplus at the end of the financial year 1920–1 was £230,500,000. By 31st March 1921 the floating debt had undergone a slight reduction to £1,275,330,000, of which Treasury Bills represented £1,120,841,000 and Ways and Means Advances [1] £154,489,000. At the same time an attempt was made to meet the situation created by the maturity of unfunded debt by the introduction in May 1920 of a new short-dated security, the Treasury Bond.[2] Treasury Bonds were to be issued at par and were to be redeemable in 1935 or on 1st May in any year from 1925 onwards, at the option either of the Government or of the holder, notice being given in the April of the preceding year. Special provisions were made with regard to the payment of interest on these Bonds. A minimum rate of 5 per cent. was fixed, but the rate actually paid would vary upwards by 2 per cent. in accordance with changes in the rates of discount on Treasury Bills.[3] By this arrangement it was intended that depreciation of the Bonds should be avoided. As a further stimulus to investment in Bonds it was announced that the proceeds from their sale would be devoted solely to the redemption of unfunded debt. They were thus to be distinguished from the Funding Loan, the major portion of the proceeds of which had in fact gone to meet a deficit.[4]

---

[1] These were all from Public Departments, Ways and Means Advances from the Bank of England having been repaid.

[2] The proceeds of this issue were devoted to the redemption of certain Exchequer Bonds maturing in 1920.

[3] If the average rate of discount on Treasury Bills during the preceding half-year was 6½ per cent. or over the rate on Bonds was to be 7 per cent.; if the rate of discount on Bills was over 5½ and under 6½ per cent. the rate on Bonds was to be 6 per cent.

[4] These Treasury Bonds were on continuous sale until 30th October 1920 when another series was brought out. The result of these two issues was unsuccessful, only £23,645,655 of Bonds being sold.

The change in monetary policy and in the monetary position shifted the centre of the debt problem. In 1921 the floating debt was still at a relatively high level, the outstanding volume of Treasury Bills having suffered very little reduction. But the dangers which this situation had presented in 1919 and 1920 had largely disappeared. The collapse of the boom had gone a long way to removing the probability that holders of Treasury Bills would refuse to renew and would drive the Government to inflationary measures. Concomitantly with this change the financing of the floating debt became much less expensive, the rate at which three months Treasury Bills were on tap falling from 6½ per cent. on 29th April 1920 to 4⅞ per cent. on 8th July 1921. The period of dear money was passing.

Thus the urgent necessity for reducing the floating debt was diminished. On the other hand, it was clear that it was undesirable to fund this debt in long-dated securities until money rates had touched bottom. Funding of Bills was, in fact, achieved by means of fresh issues of Treasury Bonds from July 1921 onwards. This, it may be urged, simply meant the replacement of debt repayable at very short notice by short-term debt and the arrangement cannot be described as a genuine funding operation. So far as payment of Treasury Bonds was likely to be demanded on thirteen months' notice there is some force in this objection. But, although it is difficult to draw a clear line of distinction, any financial operation which postpones the necessity for repayment for over a year may normally be regarded as possessing the character of funding. Debt that must be repaid within a year must enter into the calculations of a Chancellor of the Exchequer when he is framing his Budget and therefore deserves to be distinguished from other debt.

Viewed not absolutely but relatively to some point in time debt is, of course, continually passing from one category to the other. "As these short-dated maturities approach their date of maturity," said Mr. Chamberlain in his Budget speech of 1921, "they tend to pass out of the hands of the investor into the hands of the money market. . . . They become to all intents and purposes an addition to Treasury Bills." From 1921 onwards the immediate problem awaiting solution has been that of the maturity of various short-dated securities.

In comparison with this problem the problem of what is strictly termed the floating debt (Treasury Bills and Ways and Means Advances) has come to assume a very much smaller significance. Through Budget surpluses and through the cash received from the sale of Treasury Bonds the floating debt was indeed reduced. On 31st March 1926 it amounted to £704,296,000 of which £564,855,000 represented Treasury Bills and £139,441,000 Ways and Means Advances. But owing to an alteration in monetary conditions this portion of the debt has ceased to be regarded as a source of serious danger. Lord Bradbury expressed the view to the Colwyn Committee on National Debt and Taxation " that the Floating Debt was not at the present moment an active agent of financial or economic mischief, and that, so long as the public and the banks continued to treat it as ' investment,' it differed little in its nature or in its effects from a long-dated Government stock with a variable rate of interest." [1] The deflationary results of a too rapid reduction in the volume of Treasury Bills have also been emphasized. The chief disadvantage concerning the floating debt position is the variability of the rates at which that debt is carried and in particular the possibility that a rise in money rates may make the Treasury Bill an expensive method of borrowing. Such a rise of rates has, for example, been experienced in 1929. No definite figure can be fixed to which the floating debt should be reduced and policy must be guided chiefly by what is considered to be the most probable course of money rates in the future.

The main problem in recent years has thus been that of the maturity of short-term debt such as Exchequer Bonds and National War Bonds. The solution of the problem has been found in the creation of long-term debt or, to a much smaller degree, of fresh short-term debt in the shape of Exchequer Bonds [2] and Treasury Bonds. On the other hand, the problem has to some degree solved itself through conversions of Bonds under the options granted at the time of their issue into existing long-dated loans.

---

[1] Majority Report, § 99.

[2] Thus in 1920 £198,000,000 of maturing Exchequer Bonds were met partly by the creation of £167,000,000 new 5¾ per cent. Exchequer Bonds maturing 1925, but repayable in February 1922, 1923 or 1924, notice being given in the January of the preceding year.

The introduction of a 3½ per cent. Conversion Loan in April 1921 was the first attempt to meet the maturity of Bonds by the creation of new long-term security. The loan was, in fact, intended to replace £632 millions of maturing War Bonds, and no cash subscriptions were invited. The terms of the loan were as follows:

Conversion Loan £	for 5 per cent. War Bonds £	Maturing
163	100	1st October 1922
162	100	1st April 1923 1st September 1923
161	100	1st February 1924 1st October 1924
160	100	1st April 1925 1st September 1925

Conversion Loan itself is repayable at par at the option of the Government on or after 1st April 1961. It was not made repayable compulsorily by a fixed date, and it thus provided the first instance since the war of the issue of a security corresponding to the pre-war funded debt. A depreciation fund was attached to the loan, since at the end of every half-year in which the average market price of the stock has been below 90 a sum equal to not less than 1 per cent. of the amount outstanding must be set aside for the purpose of purchase of stock.

Under these terms holders of Bonds who converted would be entitled to receive for forty years a return on their original investment varying from £5 14*s.* per cent. to £5 12*s.* Mr. Chamberlain himself admitted that the offer which he had made was generous. But he defended it on the ground that

> "it is impossible to allow ourselves to drift in the hope of being able to get better terms before these heavy maturities come upon us. With such an immense Floating Debt and these large maturities coming, no provident Chancellor of the Exchequer could face the year 1922–3 without making a great effort to lighten the burden." [1]

Moreover, the loan could be regarded as "a necessary preliminary to funding." The actual result of the operation was the creation of £266,085,713 of Conversion Loan in exchange for £164,067,322 of War Bonds.

[1] Budget Speech, 25th April 1921.

The application of the term "conversion" to this loan is certainly misleading. The transformation of one form of debt into another may indeed be described as a conversion, but in accordance with ordinary financial usage conversion of debt has meant the replacement of debt bearing a given rate of interest by debt bearing a lower rate of interest. The Conversion Loan of 1921 secured a reduction neither of interest nor of principal. On the contrary, it involved an addition of £1,110,000 to the annual charge and £102,018,000 [1] to the principal of the debt. Actually, therefore, the introduction of the loan represented nothing more than a funding operation.

The financial policy which lay behind this loan betrays an over-anxiety to fund the short-term debt. It would probably have been better to have met actually maturing War Bonds by the issue of Treasury Bonds and to have withheld, until a further fall of interest rates had occurred, the issue of a long-dated security.[2] Such an arrangement might have delayed the reduction of the floating debt, but by 1921 the urgency of the need for this reduction had diminished if not disappeared.[3] At this time, however, the duration of the trade depression was much underestimated and it was probably believed that a revival of trade would within a short period force interest rates up again.

A large quantity of Conversion Loan was also issued in 1922 in exchange for Treasury Bonds. Holders of 5½ per cent. Treasury Bonds (1921) were given the right to exchange into Conversion Loan at the rate of £146 of Loan for £100

---

[1] Against this increase, however, must be set the saving of premiums which would have been due on the repayment of War Bonds.

[2] The course of the prices of securities was as follows:

	End of April 1921	End of 1921	End of April 1922
Consols	48½	50¼	59
5 per cent. War Loan.	88¾	92¼	99⅞
4 per cent. Funding Loan	70¾	76½	87⅜
4 per cent. Victory Bonds	77¾	81¾	89⅜
3½ per cent. Conversion Loan	—	66¼	76½

[3] Mr. Chamberlain asserted that financial authorities were agreed "that the present time is not suitable for attempting to fund the Floating Debt."

of Bonds. Under this arrangement £313,201,453 of Conversion Loan were created and £214,521,544 of Treasury Bonds were surrendered. In the same year £14,476,628 of 5 per cent. Exchequer Bonds were exchanged into Conversion Loan (at the rate of £136 Loan for £100 Bonds). Better terms were secured in dealing with the maturity of certain 1922 and 1923 War Bonds, £134 of Loan being issued in exchange for £100 5 per cent. War Bonds. £94,482,098 of Loan were created and £70,509,029 of War Bonds were surrendered. Since that time the Loan has been issued not in exchange for maturing short-term debt but for cash subscription. £129,660,000 were thus offered for tender in 1925, the average price received for £100 stock varying from £76 6*s*. to £77 16*s*. 11·9*d*. Through these operations Conversion Loan has come to form, after the 5 per cent. War Loan, the largest element in the internal debt.

Three other long-term issues have also been made, partly with the idea of meeting maturing short-term debt, partly with the object of breaking up the vast block of the 5 per cent. War Loan. In April 1924 came a 4½ per cent. Conversion Loan (1940–44) which was offered in exchange for 5 per cent. War Loan, the terms being £103 of Conversion Loan for £100 of War Loan. Under this arrangement £148,407,113 of War Loan were surrendered for £152,859,093 of Conversion Loan. Later in the same year 4½ per cent. Conversion Loan was issued in exchange for 5¾ per cent. Exchequer Bonds at par plus a cash payment of £2 5*s*. £57,727,878 of Conversion Loan were created as a result of this operation.

In 1927 an issue of 4 per cent. Consols was made partly for cash, partly in exchange for other securities. The price of the cash issue was 85; the terms of exchange were as follows:

4 per cent. Consols		Maturing Debt	
£		£	
117¾	for	100	5 per cent. Treasury Bonds
124¼	,,	100	5 per cent. War Bonds
118	,,	100	4 per cent. War Bonds

Four per cent. Consols are redeemable at par in or after 1957 at the option of the Government. This loan therefore provides the second instance since the outbreak of the war of the issue of a security which the Government is not obliged to redeem by a certain date, and therefore partakes of the character of the pre-war funded debt. A special sinking fund is attached to the stock since the Government bound itself to apply during the next ten years £2¼ millions per quarter to purchases in the market so long as the price is below par. £166,384,125 of Consols were created, £133,781,876 in exchange for Bonds, £32,602,249 for cash subscriptions.

Finally in 1929 there was an issue of 5 per cent. Conversion Loan (1944–64) at par, partly for cash, partly in exchange for 5½ per cent. Treasury Bonds (1930). The amount of cash subscribed was £154 millions, the amount of Treasury Bonds converted £79 millions.[1]

The problem of maturing short-term debt has also been met by the issue of Treasury Bonds; though the main purpose of these Bonds has been the funding of floating debt. A more important factor has been the exchange of War Bonds under the rights granted at the time of their issue into 5 per cent. War Loan. The amounts thus exchanged have been as follows:

	National War Bonds £	to	5 per cent. War Loan £
1922–3	139,660,477		147,010,907
1923–4	70,470,420		74,179,365
1924–5	38,347,699		40,365,989
1925–6	57,613,430		60,645,709
1926–7	45,555,228		47,952,865
1927–8	84,654,003		89,109,433
	£436,301,257		£459,264,268

Thus, short-term debt has gradually been replaced by long-term debt, and in two cases (3½ per cent. Conversion Loan and 4 per cent. Consols) by securities which correspond essentially to pre-war funded debt. Of genuine conversion, *i.e.* replacement of debt bearing a given rate of interest by debt bearing a lower rate of interest, there has been relatively little. The Colwyn Committee estimated that up to 31st March 1926 the net saving on interest amounted to only

---

[1] Every letter of allotment carried with it the right to convert an equivalent amount of 5 per cent. War Loan at par into Conversion Loan.

£1,191,000, although some account, they pointed out, should be taken of the saving of premiums of £15,149,000 on £603,980,000 of cancelled War Bonds. The annual savings which have been achieved have arisen chiefly through the introduction of 4½ per cent. Conversion Loan and 4 per cent. Consols. Whatever part financial policy may have played it is nevertheless true that the fall in the rate of interest has not been sufficient to make possible any considerable savings through conversions of debt.

Maturing short-term debt is now[1] represented by £600,000,000 of Treasury Bonds which should not present any serious difficulty. It is therefore clear that financial policy must be governed in the future mainly by consideration of the long-term debt and in particular of its conversion from a higher to a lower rate of interest.[2] The Chancellor who has to deal with this question is here confronted by the vast mass of the 5 per cent. War Loan which is redeemable between 1929 and 1947. This loan amounted on 31st March 1929 to £2,184,468,777. Some attempt has been made to break it up and thus to reduce the problem to more manageable dimensions, but its magnitude is still such as to hinder the success of any conversion, should a fall in the rate of interest make such an operation possible.

The importance of the 5 per cent. War Loan becomes still more evident when we turn to an examination of the other elements in the internal long-term debt. If we exclude Consols and Victory Bonds, since in both cases conversion is out of the question, we find that the major portion of the remaining debt is not redeemable for what is roughly the period of a generation. Five per cent. War Loan is indeed not only the largest single Government stock but also practically the only stock upon which financial operations can be performed during the next decade.

On the finance of the years 1914–20 it is difficult to pass judgment. War inflation, for example, may be regarded as a necessary evil: but there seems to be little justification for the failure to balance the Budget and to check inflation in 1919. Reluctance to impose additional taxation was seen on three important occasions—in Mr. Lloyd George's Budget of 1915, Mr. Bonar Law's Budget of 1917 and Mr. Chamberlain's Budget of 1919. The proportions of receipts derived from revenue to those derived from loans seem low, particularly when compared with the corresponding proportions for the latter part of the Napoleonic Wars.[1] They were as follows : [2]

---

[1] 31st December 1929.

[2] For the question of conversion *vide infra*, p. 288 *et seq.*

Year ending	Loans per cent.	Revenue per cent.
31st March 1915	64	36
,, ,, 1916	78	22
,, ,, 1917	74	26
,, ,, 1918	74	26
,, ,, 1919	65	35
,, ,, 1920	19	81

But simple comparisons of this sort are dangerous. Mr. Rees has pointed out that " the circumstances of two different periods, however similar in broad outlines, present such discrepancies in details that the candid inquirer will refuse to draw definite inferences." [3] Among these discrepancies there may be mentioned, first, the relative degrees of concentration of war expenditure. Clearly, if the whole expenditure of the French Wars had been confined to the years 1802–15, the proportion of loans to total receipts would have been considerably higher than it actually was for that period. In other words, in a comparison of two different periods account should be taken of the ratio of average annual war expenditure to national income. Only with some such qualification can any valid conclusions be drawn from an examination of the proportion of loans to receipts. Secondly, there is the question of the elasticity of the tax system. Here, however, the conclusion to be drawn is almost wholly unfavourable to the financing of the Great War. Great Britain entered the war with a system of direct taxation which was both elastic and productive. Failure to exploit this system more fully constitutes probably the most serious charge which can be brought against the financial policy of 1914–18.

---

[1] Contrast, however, Knauss, *Die deutsche, englische und französiche Kriegs-finanzierung* (p. 183) : " Die Finanzpolitik Grossbritanniens, 1914–18, entsprach am besten der Forderung, die Kriegskosten soweit möglich, durch Steuern zu decken."

[2] The following table is taken from G. Findley Shirras' *Science of Public Finance*, p. 499. Compare also Kirkaldy, *British Finance, 1914–21*, p. 215 ; Seligman, *American Economic Review*, January 1919.

[3] *A Short Fiscal and Financial History of England*, 1815–1918, p. 220.

THE WAR DEBT

	Dead-weight Debt.		Debt Charge.	Statist Index No.
	Internal.	External.		
	£	£	£	
1914	649,770,091	—	22,668,896	85
1915	1,104,967,076	—	60,249,311	108
1916	2,072,531,206	60,616,438	127,250,493	136
1917	3,611,134,688	400,311,220	189,851,066	175
1918	4,823,176,676	1,048,673,961	269,964,650	192
1919	6,070,096,772	1,364,852,657	332,033,708	206
1920	6,553,030,895 [1]	1,278,713,405	349,598,615	251
1921	6,423,846,516 [1]	1,161,563,174	332,294,347	155
1925	6,524,771,914 [1]	1,121,599,874	358,229,246	136

[1] Includes Victory Bonds tendered for death duties and held by the National Debt Commissioners.

CHAPTER XIV

THE PROBLEM OF REPAYMENT

Prior to the end of the war the vast growth of the Debt had brought forth proposals for large-scale repayment by means of a levy on capital.[1] At the time when these proposals were first raised it was evidently feared that without a considerable sacrifice of this sort it would be impossible for solvency to be maintained. Thus in a volume entitled *How to pay for the War*, published in 1916 under the auspices of the Fabian Research Department, it was suggested that "even an income tax at ten shillings in the pound—even if augmented by every kind of indirect taxation that the ingenuity of the Chancellor of the Exchequer can devise—may possibly not suffice to make both ends meet in that momentous first or second Budget of Peace." The financial danger to which the country would be exposed in the event of another war in the near future was pointed out and it was argued that for financial security not less than £1,200,000,000 must be "discharged at once." Various means which might be considered available for this reduction of debt were at once rejected. The death duties, however much increased, could not be made to yield anything like enough to meet the requirements of the plan. The idea of imposing a special tax on the owners of land or of confiscating railways or coal mines was dismissed as inequitable. The suggestion was therefore put forward that, as an exceptional measure not to be repeated, all property owners of the United Kingdom possessing as much as £100 and all adult inhabitants excepting "the poorest"[2] should be called upon to make a special contribution for the repayment of £1,200,000,000 of war debt.

---

[1] Mr. Snowden's proposal for a graduated tax on capital put forward in 1915 aimed rather at the raising of revenue for the war.

[2] Apparently those earning less than thirty shillings a week were to be excluded.

The private capital wealth of the community was taken at £8,000,000,000–£10,000,000,000, and on this was to be levied a 10 per cent. tax which would be spread over ten years. But it would be " invidious to place the burden on property owners alone." Accordingly a special Citizen Tax would be levied for the same purpose, in the shape of a poll-tax of ten shillings per head per annum. These two taxes together, the War Levy and the Citizen Tax, might be expected to yield £100,000,000 per annum.

Into the obvious defects of this plan it is not necessary to go. Before long the proposals had been remodelled and developed into the form in which they were put forward by the Labour Party in the general elections of 1922 and 1923. During the war, however, the idea of a levy found acceptance outside the ranks of the Labour Party. Mr. Bonar Law in a reply [1] to a deputation from the Trade Union Congress declared that in his view " the question whether or not there should be a conscription of wealth, then, is entirely a matter of expediency." The problem was whether it would pay the people who had money, and the country as a whole, " to have a general capital levy and reduce the National Debt as far as you can, or have it continued for fifty years as a constant burden of taxation." His own feeling was that " it would be better both for the wealthy classes and for the country to have this levy of capital and reduce the burden of the National Debt." He was convinced, however, that it could not be done while the war was in progress.

In the Budget debates of 1918 Mr. Snowden and Mr. Arnold argued strongly in favour of the levy on capital. Mr. Arnold in an able speech [2] did much to dispel the misconceptions which had grown up round the scheme. Liquid capital would not be absorbed by the levy, since the greater portion of it would not be paid in cash. Nor would there be any serious difficulties arising out of the realization of securities, since there would be very little realization at all. Payment would be made either in war stock or in such securities as colonial, corporation or railway stocks which would be accepted by the Treasury at fixed prices. In certain cases—for example,

[1] *The Times,* 26th December 1917, p. 3.

[2] 23rd April 1918.

where the property was in land or real estate or was locked up in the business—credit facilities would be extended by the banks. In other cases payment could be made by instalments. The method of valuation would be the same as that employed in the administration of the death duties. Mr. Arnold dealt with other objections by pointing out that they applied equally to a high income tax. A high income tax quite as much as a capital levy discouraged thrift and was inequitable as between the saver and the non-saver. So far as the debt to be cancelled was concerned, the fact that the 5 per cent. War Loan could not be repaid before 1929 did not present any serious difficulty. There were large amounts of Exchequer Bonds, National War Bonds and Treasury Bills available; the holders of 5 per cent. War Loan could be given the option of being paid off earlier on advantageous terms; and it had to be remembered that the levy itself would be paid in war stock.

But the capital levy scheme was not only free from the disadvantages with which it was supposed to be attended; it possessed certain positive advantages. By its help debt would be repaid while prices were high and the value of money was low; while if the debt were not paid off, and prices fell as they were almost certain to fall, the real burden would be considerably increased. If the levy were adopted income tax could be reduced at once to 2*s.* 6*d.* in the £ and super-tax could also be reduced. Finally, the great point in favour of the levy lay in the fact that it would be paid mainly by the older men who had not fought in the war, and that thus an equality of sacrifice would be achieved. If the debt were not paid off high rates of income tax would be necessary and these rates would press more heavily upon the younger men.

There was naturally a good deal of difference of opinion as to the amount of wealth available for assessment and as to the yield of a levy. Mr. Arnold put the taxable capital of the country at £24,000,000,000 and suggested that two separate levies should be made, the first as soon as possible (probably after the end of the war), the second two years later. The rate would on the average amount to 12½ per cent. of the total capital, but there would be a graduated scale on the same principle as the assessment of death duties, but somewhat steeper.[1] Those whose property was less than £1,000 would be exempt. The total yield of the two levies was estimated by Mr. Arnold at £6,000,000,000. Thus more than three-quarters of the National Debt would be wiped out if these proposals were adopted.

Estimates of the capital wealth of the country varied considerably. Mr. Pethwick Lawrence in his *Levy on Capital* (1918) put pre-war aggregate net wealth[2] at £15,500,000,000 and post-war wealth less State's net debt at £12,900,000,000. On this basis he calculated that a flat rate of 6 per cent. would yield about £950,000,000, one of 12½ per cent. would yield £2,000,000,000 and one of 38 per cent. would cancel the whole debt. Private wealth available for levy purposes had grown, he held, from £12,500,000,000 in 1914 to £15,000,000,000.

Dr. Stamp's figures differed again from both these estimates. In *British Incomes and Property* (1916) he put aggregate wealth in 1914 at £14,319,000,000 ± £1,867,000,000. Of this total probably £11,000,000,000 would have been available for a levy, and he made a tentative estimate that this figure had been increased by £5,250,000,000 during the war (*i.e.* up to 1916), making a total of £16,250,000,000 available.[3] In his *Wealth and Taxable Capacity* (1922) he said: "while I prefer to give no estimate of capital wealth at the present time . . . I should like to add that in my judgment it cannot *exceed* 19 to 20,000 million £ and is probably much less. The aggregate of individual wealth has moved from 11,000 millions in 1914 to about 15,000 millions at June 1920."

Much difficulty was naturally introduced by the changing money values of these years. Thus some of the estimates

---

[1] The following rates were suggested:

Capital £	Rate
5,000	4½ per cent. at each levy
20,000	7½ " " "
60,000	12½ " " "

[2] Including State and municipal wealth and deducting State and municipal debt.

[3] The memorandum produced by the Board of Inland Revenue for the Select Committee on the increase of war wealth (1920) argued that Dr. Stamp's £5¼ million was "considerably above the mark" and put the net increase at £4,180,000,000. (102 of 1920.)

given above are not strictly comparable, referring as they do to different periods. Estimates of the yield of a levy or levies varied still more widely, different rates of graduation and different levels of exemption being proposed.

In 1919 the proposal for a levy on capital became in some degree confused with the proposal for a levy on war wealth. Mr. Arnold again in the budget debates of the year put forward his scheme and declared : " it is merely an alternative method of meeting a liability which has to be met anyhow, and which ought to be met by the wealthier classes of the country." If the levy were not carried out high rates of taxation would have to be endured for a considerable period.[1] Mr. Chamberlain, on the other hand, displayed a strong opposition to the suggestion. He thought that it would be a bad thing now to introduce a levy when for the past five years they had been begging people to save and when people were still being asked to save. He foresaw serious difficulties of valuation, the solution of which would exceed the power of any revenue administration in the world. There would be an immense disturbance of credit, and if the State to avoid trouble agreed to take payment in kind " we should be left the owners of odd parcels of land and odd parcels of shares in every conceivable part of the country and in every conceivable undertaking." Finally, there could be no guarantee against a repetition of the experiment and if such repetition were anticipated there would be the greatest possible discouragement to industry and enterprise.

Later in the year, however, the difficulties of the financial situation compelled Mr. Chamberlain to consider more drastic measures than those which had appeared in his Budget. He declared himself still opposed to a general levy on capital, but he thought the proposal for a special levy on war wealth stood on an entirely different footing : he even declared it " very attractive as an abstract proposition."[2] A select committee had been appointed in the summer to go into the question. This committee received memoranda from the Board of Inland Revenue containing a scale with graduated rates of taxation of war wealth which, it was estimated, would yield £500,000,000.[1] This was the minimum yield which in the opinion of the committee would have justified a levy of this character. The business men who appeared before the committee declared that the levy would result in "unemployment, panic and disaster." The economists dissented from this view and maintained that "the imposition of such a tax could not diminish the wealth of the country, expressed in terms of things, and that in so far as taxpayers were impelled to reduce their expenditure in order to meet their liability to the tax the actual capital resources of the country would be improved. If there were any disturbance of credit and finance such effect must, they considered, be purely temporary while in so far as the tax was applied to the reduction of the floating debt a reduction in the price of commodities should result." Mr. Blackett, an official of the Treasury, argued that the levy, if practicable, would be of immense service in reducing the swollen volume of the floating debt. In this respect he contrasted the levy favourably with a funding operation; the levy would be deflationary,[2] but it would also reduce debt; funding would be deflationary, but it would make no impression upon the debt, the real burden of which would thus be increased.

---

[1] The levy was supported by the Independent Liberals as well as the Labour Party, and Mr. Acland pointed out that Ricardo had put forward a similar proposal in 1817.

[2] Financial statement of 29th October 1919.

The committee refused to come down very definitely on one side or the other. It reported that

> "although the administration of a tax of this character would involve many difficulties yet those difficulties should not be insurmountable, and in its main features the scheme of the Board of Inland Revenue, as now announced, is practicable in an administrative sense."

It concluded that

> "if the financial position of the country is such that it becomes a matter of urgent necessity to raise a sum of the magnitude of £500,000,000 which cannot be obtained by other means, the objections raised against a tax of this character should not be allowed to stand in the way of the imposition of such a tax to meet the national emergency."

---

[1] In estimating the yield the Board had allowed for the loss of income tax, super-tax and death duties on the wealth taxed away: they did not think, however, that "such loss is likely to be heavy." It was not considered practicable to carry the exemption limit below £5,000.

[2] Mr. Arnold in 1919 thought that such deflationary effects as the levy might be supposed to produce, through a reduction in the volume of collateral, would be highly desirable.

Fortunately since the time of the committee's appointment financial conditions had been modified. Mr. Chamberlain was proposing to raise the rate of excess profits duty, an arrangement which, he had announced, would satisfy him as an alternative to the levy. Moreover, the problem of the maturing debt was being met by the issue of 5–15 year Treasury Bonds. Thus the scheme for a levy on war wealth collapsed.

The proposal for a capital levy, however, had by no means been set aside. It formed one of the main issues in the General Elections of 1922 and 1923 when it was keenly advocated by the Labour Party.[1] It was represented as the only serious plan for effecting a large-scale redemption of the Debt. Sinking funds, it was pointed out, were inadequate and precarious, whilst conversions were only applicable to a portion of the debt and could on the most favourable assumptions effect only a small reduction in the annual charge. Since then, however, the proposal has faded from the programme of the Labour Party and it is highly improbable that it will ever be carried out.[2]

The case for a capital levy was undoubtedly very strong in the years that immediately succeeded the war, and with it might have been combined a special levy on war wealth. Debt would have been paid off then when the value of money was a good deal lower than it is now, and the country could have rid itself of the greater portion of the burden inherited from the war. The subsequent fall of prices, however, and more recently the absence of any well-defined tendency in the general price level have considerably weakened the case for the levy.[3] Moreover, a period of severe trade depression seems an unsuitable time in which to carry out a drastic operation on the debt.

The main objections to the capital levy fall under three heads. First, the scheme may be regarded as inequitable in its treatment of persons in receipt of incomes from property as compared with persons in receipt of incomes from work. This, however, could be remedied by a differentiation in the rate of income tax on large earned incomes. Moreover, supporters of the capital levy have pointed out that their proposal possesses the merit of taxing those who have invested their savings in the purchase of capital goods that do not yield a money income and who under present arrangements escape taxation. Secondly, there is the problem of the danger of a repetition of the experiment. Obviously no guarantee against repetition could be given and anticipation of such a repetition would undoubtedly have serious effects upon saving and enterprise.[1] Moreover, the beneficial effects in the way of reduced taxation which the levy would produce might disappear under the influence of increased expenditure on social services which advocates of the levy have argued would become possible after a considerable portion of the debt had been redeemed. Finally, the net saving yielded by the levy has to be ascertained. Allowance has to be made for the decreased yields of income tax, super-tax and death duties which would result from the imposition of a levy owing to the reduction in the amount of private wealth available for taxation. Thus, as Mr. Marriott put it in 1919 : " You cannot conscript the same capital both during the lifetime of its owner and also after his death." Estimates of the net saving which have been put forward [2] suggest that it would be much less than has been anticipated. It is doubtful whether a saving, say of £60,000,000 per annum on the interest charge on the debt would be sufficient to justify a disturbance on the scale which a £3,000,000,000 levy would cause.[3]

---

[1] Cf. *Labour and the War Debt, a statement of policy for the redemption of war debt by a levy on accumulated wealth.*

[2] The Minority Report of the Colwyn Committee (Cmd. 2800, 1927) argued, however: "A Capital Levy would still in our judgment be the best method of dealing with the debt, provided that it were generally approved and assured fair treatment by the taxpayers, and were not obstructed by artificial multiplication of appeals, or by deliberate attempts to create panic in the minds of the public." Cf. also Dr. H. Dalton, *Public Finance*, 5th Edit., p. 265.

[3] Cf. Colwyn Report, §§ 737–43.

What, then, were the actual methods which were employed after the war to achieve a reduction of debt and how far were they successful ?

---

[1] It was, however, argued in reply that so long as levy proposals were in the air these effects were being felt, so that the introduction of a levy could not worsen the situation in this respect.

[2] Cf. Colwyn Report, §§ 725–36.

[3] This argument concerning the difference between gross and net saving applies of course equally to other methods, such as sinking funds and conversions, of dealing with the debt.

In 1919 Mr. Chamberlain contemplated, in the plan for the Budget of a future normal year which he drew up, a sinking fund of $\frac{1}{2}$ per cent.; the debt charge including such a sinking fund he put at £400,000,000.[1] In that year, however, he not only was unable to meet such a charge but he had to borrow to cover an estimated deficit of £233,810,000. By 1920 conditions had altered. It was decided that borrowing should cease, and a surplus was to be secured to be devoted to the repayment of debt. Mr. Chamberlain estimated on the existing basis of taxation a surplus of £164,000,000, but he held that this amount, though large, was insufficient for the purpose of redemption. The sum represented indeed more than 2 per cent. of the total debt, and a sinking fund of 2 per cent. would redeem the debt in twenty-six years. Such a provision would be extravagant under ordinary circumstances, but, as Mr. Chamberlain pointed out, circumstances were not ordinary. He therefore budgeted for a surplus of £234,000,000 which was equivalent to a sinking fund of 3 per cent.

The actual surplus realized was £230,500,000, which was applied to the redemption of debt. The figures as they stand are, however, misleading, since they suggest that the sum was represented by an excess of revenue over expenditure. The surplus was in fact secured by the sale of war stores, the proceeds of which were treated as revenue and introduced under the heading "Miscellaneous Revenue" into the Budget. This procedure was severely criticized on the ground that it was a thoroughly unsound piece of accounting to treat the proceeds derived from the sale of assets as revenue. Orthodox treatment of the subject would have entered transactions relating to the purchase and sale of war stores in a capital account.[2]

For 1921–2 a surplus of £103,500,000 was estimated, but

---

[1] Cf. Budget Speech, 30th April 1919; also statement of 29th October 1919.

[2] The sales of war stores and material were as follows:

	Sales of Surplus Stores £	Sales of Raw Material £
Armistice to 30th June 1921 . .	303,758,886	278,570,870

Total: £582,329,756. (Disposal of Surplus Government Property, Cmd. 1412 of 1921.)

only £45,693,000 was realized. But realized surpluses during these years tell very little of the whole story of debt redemption. Certain statutory sinking funds existed for which provision was made in the Budget, while on the other hand there were certain current obligations not yet matured for which no allowance was made.

(1) The old fixed debt charge was revived in 1920 and fixed at £24,500,000.

This charge applied only to the pre-war funded debt, the war debt falling entirely outside it.

(2) Repayment was involved in the provision made for Life and Terminable Annuities.

(3) There were the depreciation funds for the 5 per cent. and 4 per cent. War Loans.[1]

(4) There was the similar fund in connection with the 3½ per cent. Conversion Loan. At the close of each half-year in which the average daily price of the loan fell below 90 a sum equal to not less than 1 per cent. of the amount of the loan outstanding had to be applied in purchase of Conversion Loan for cancellation.

(5) Sinking funds were attached to the 4 per cent. Victory Bonds and 4 per cent. Funding Loan. At the close of each half-year a sum equal to 2¼ per cent. of the original amounts of these securities must be set aside, the remainder, after paying the sums required for interest, to be devoted to redemption of the Bonds and Loan. In the case of Victory Bonds the sinking fund is to be used for annual drawings at par: in the case of Funding Loan the sinking fund is to be devoted to purchase and cancellation when the price of the loan is below par.[2]

(6) Victory Bonds and Funding Loan might be tendered in payment of death duties, the former at par, the latter at the issue price of 80. Bonds and Loan thus surrendered are to be acquired by the National Debt Commissioners and held by them until drawn or repaid.[3]

Against these statutory obligations for repayment there must be set the failure to make any allowance for interest accumulating on outstanding Savings Certificates. Since 1919 provision has been made in the Budget for interest on these Certificates, but only to the extent to which it is anticipated that it will have to be met during the current year on Certificates repaid. No account is thus taken of accumulating interest, and the Colwyn Committee in 1927 thought it must be pointed out that the existing "Sinking Fund provision is offset to the extent of the interest not provided."[1]

---

[1] 1920–21: £31,920,268; 1921–22: £29,260,745.

[2] Victory Bonds: 1920–21, £1,833,585; 1921–22, £1,906,905.
Funding Loan: 1920–21, £2,081,984; 1921–22, £2,194,727.

[3] Sums required: 1920–21, £7,948,000; 1921–22, £9,724,000.

But even the statutory sinking funds were not free from attack. In 1922 Sir Robert Horne, who had succeeded Mr. Austen Chamberlain as Chancellor, proposed to suspend the new sinking fund and to borrow any money that might be required to meet these statutory obligations. This complete change of policy was defended on the ground that during the severe trade depression which had succeeded the post-war boom a reduction of taxation was required. The income tax was lowered by 1*s*. in the pound, the tea duty from 1*s*. to 8*d*. The view was thus accepted that the amount devoted to debt redemption should be regulated by the conditions of trade.

In the debates on the Budget Mr. Asquith had described Sir Robert Horne's policy as a gamble. The gamble proved to be successful and the Chancellor's estimates were completely falsified by the financial results of the year. Chiefly as a result of reduced expenditure, not only was it found possible to meet the statutory sinking fund requirements without borrowing but a Budget surplus of £101,516,000 was realized as opposed to the modest £706,000 which Sir Robert had estimated. A very large sum was thus available for the reduction of debt.[2]

Campaigns for economy in public expenditure are, however, rare, and it was improbable that in the future surpluses on the scale on which they had occurred during the preceding three years would be realized. It was fairly clear that any considerable reduction of debt could only be accomplished by the introduction of a fixed budgetary provision for redemption.

---

[1] Report, § 998.

[2] It is important to remember that under the Finance Act of 1920 accruing surpluses need not be retained but may be devoted to debt redemption by the Treasury throughout the financial year.

Meanwhile the Labour Party's capital-levy programme had forced the problem of the debt upon public attention.

Under these circumstances Mr. Baldwin, who had become Chancellor in Mr. Bonar Law's Government in 1922, decided to establish a new sinking fund. "There will be," he pointed out, "plenty of debt for our grandchildren to deal with, but equally debt to-day is insistent and knocking at the door of this generation."[1] He proposed to abolish the fixed charge introduced by Northcote in 1875, and to substitute for it a fixed non-cumulative sinking fund for which the following provision would have to be made:

	£
1923–4	40,000,000
1924–5	45,000,000
1925–6 and Subsequent Years	50,000,000

The scope of this fund was, however, entirely different from and much wider than the scope of the old fixed charge. The fixed charge referred to the pre-war funded debt. Mr. Baldwin's fund was intended to cover the whole of the existing debt, and to include the whole of the statutory provision for debt redemption. He himself was careful to point out that the £40,000,000 which he was now providing represented mainly statutory sinking fund requirements.[2] In fact, if allowance be made for the abolition of the old fixed charge, it is clear that he was making hardly any addition to the existing provision for redemption of debt.

Nevertheless he felt that he must make some justification for his policy. First, the only other way of meeting these statutory requirements would be by borrowing. "We may

---

[1] Budget Speech, 16th April 1923.

[2] *Viz.*:

For 4 per cent. Victory Bonds and Funding Loan	£4,428,000
,, 3½ per cent. Conversion Loan	£13,500,000
,, 4 per cent. Victory Bonds surrendered for death duties	£7,500,000
,, Sinking Funds on American Debt	$23,000,000
,, Repayment of American silver purchase Loan	$30,500,000

This included no allowance for depreciation funds on the 5 per cent. and 4 per cent. War Loans.

suggest borrowing for Sinking Funds once, but to suggest it for two successive years would be a serious blow to our credit." Secondly, "it should be remembered that money spent on the reduction of internal debt returns at once to the investment market . . . and nothing, I believe, will ease the finding of capital for industrial purposes so much as a steady and recognized policy of redeeming public debt." Thirdly, the burden of taxation must be considered, and "whatever saving we may be able to make in Supply Services the time will come when it will be on debt that big savings for the future will have to be found." It was important so to regulate the debt policy of the country as to be able to secure a conversion of the 5 per cent. War Loan which was redeemable in 1929.

Criticisms were directed from two opposing sides against this sinking fund. There were those who maintained that in the matter of redemption the right policy was to go as slowly as possible, and that the first aim of financial administration should be to reduce taxation, the burden of which was delaying a trade revival. Sir Robert Horne went so far as to prophesy that the Chancellor would "raid his Sinking Fund before he will add a penny to the income tax," and declared that he would have been satisfied if the statutory requirements alone had been met. Sir Alfred Mond came nearer to meeting the arguments in favour of redemption by denying that money applied to the purchase of Government securities flows back into industry. He asserted that the holders of these securities were in the main banks, trustees and insurance companies, who would reinvest the money in gilt-edged securities. Even if it did return to industry he was not satisfied that it would do so quickly enough to produce any solid results. "Take money out of industry in order to pay off the people with gilt-edged investments and that money returns to industry too slowly to be of much use."

These arguments were coupled with a criticism of the arrangement whereby the £101,000,000 surplus which had been realized automatically went to the redemption of debt. Sir Alfred Mond asked: "Why then should we not be allowed to divert some of this money for big road schemes which are so much wanted and which produce so large an amount of employment?" It was unreasonable that "the money should go into the vast sea of debt instead of being utilized to fructify and develop the country." Mr. Lloyd George, he pointed out, had in 1912 diverted sums from the old sinking fund to expenditure on development and on sanatoria. Commander Hilton Young declared that the process of "placing £100,000,000 out of the taxpayers' pocket last year to the redemption of debt was thoroughly bad finance." The money should have been spent on development. Similarly, Sir Laming Worthington Evans argued that part of the surplus should "be used for capital expenditure on the housing of the people." All alike maintained that Parliament had the right to dispose of the surpluses which constituted the old sinking fund as it thought best.

But the opponents of debt redemption were not content with an attack upon the sinking funds. They were prepared to add to the debt by the establishment of a scheme for funding war pensions. Such a scheme had, as we have seen, been brought forward after the Napoleonic Wars and had collapsed through failure to secure the adoption of the terms which the Government proposed. It had been severely criticized by the Finance Committee of 1828 as being a part of that financial policy which was at the same time devoting large sums to the redemption of debt.

The proposal for funding war pensions has a good deal of plausibility. "Why," it was argued, "should people living to-day have to pay the maximum amount in respect of a sum which is becoming less and less every year?"[1] War pensions were part of the cost of the war and might be funded like any other war charge. These arguments, however, clearly prove too much. Pushed to their logical conclusion they would justify the funding of the whole of the charges attributable to the war. Fortunately the generation which has waged a war has usually considered it to be reasonable that it should itself bear a certain proportion of these war charges and should not push them all on to the shoulders of posterity.

As against this policy of slowing down there was, however, a considerable volume of opinion which favoured a more rapid redemption of the debt. Mr. Baldwin's non-cumulative fund would, it was pointed out, take one hundred and fifty years to cancel the whole debt. Moreover, the real sinking fund, when allowance was made for interest accrued on Savings Certificates and for the repayment of National War Bonds at a premium, would be much less than the nominal figure at which the fund had been fixed. A Treasury Circular of 1921 was referred to, which, in calling for a reduction of public expenditure, had laid down £100,000,000 per annum as the standard to be set for debt redemption. Nor could the present sinking fund be compared favourably with pre-war standards. Before the war, Mr. Asquith argued, the sinking fund amounted to 1–1¼ per cent. of the debt; 1 per cent. now would involve a sum of £77,000,000 per annum. The Labour Party contrasted their proposal for a capital levy with the methods which were now being favoured. Mr. Baldwin's sinking fund coupled with such conversion operations as could be introduced would produce very little impression on the debt. The *rentier* class would continue vampire-like to feed upon the rest of the community.

---

[1] Speech of Sir Samuel Roberts, 16th April 1923.

The new sinking fund of 1923 can hardly be regarded as adequate if the proportion which it bore to the total debt, internal and external, be considered.[1] The smallness of the fund would not perhaps have been a matter for criticism provided that the fund itself had been cumulative. But there was no provision for the growth of the sinking fund by the addition to it of the interest on debt redeemed or purchased. An unchanging amount was to be devoted annually to repayment of debt. Nor does the fund seem adequate if it be compared with statutory obligations for repayment. At the outset, it is true, it covered something more than these statutory obligations: thus in 1923–4 £1,383,835, and in 1924–5 £12,226,404 were available for debt redemption in general. But these sums were not large, while, on the other hand, the sums to be devoted to the repayment of the American debt, of Funding Loan and of Victory Bonds would automatically increase. Moreover, as we have seen, no allowance was made for interest accrued on Savings Certificates or for the repayment of War Bonds at a premium. Mr. Baldwin indeed pointed out that his figure could stand comparison with the £100,000,000 of the Treasury Circular, since in 1920–1 the prices of Government stocks were much lower and accordingly £32,000,000 had had to be provided for the depreciation funds on the 5 per cent. and 4 per cent. War Loans, and £84,000,000 on account of securities tendered in payment of Excess Profits Duty and Death Duties. He seemed to forget, however, that when prices are higher the capacity of the sinking fund to repay debt by the purchase of securities is reduced. It is difficult, therefore, to believe that he intended his sinking fund to provide a solution of the debt problem.

---

[1] The £50,000,000 sinking fund was approximately ·006 of the debt.

The sums required for this sinking fund were during the first two years of its existence duly met out of the national revenue. In 1925, however, the payment of the coal subsidy seriously affected the financial position, and the year closed with a deficit of over fourteen millions, so that in effect the sinking fund had to be borrowed. In 1926–7 an attempt was made to retrieve the position and the sinking fund was fixed at £60,000,000. But the year 1926–7 closed with a still bigger deficit, £36,693,000, so that the fund had again to be borrowed. In the following year the fund was raised further to £65,000,000. Finally, in 1928, it was announced that the old principle of a fixed debt charge would be revived, and this charge has been settled at £355,000,000. Under these arrangements, it has been somewhat optimistically suggested, the debt will be repaid in fifty years, although it must be noted that all savings arising out of conversion operations are to go to the benefit of the taxpayer.

Authoritative pronouncement on the subject of the debt and the policy and method of redemption is to be sought in the Report [1] of the Colwyn Committee on National Debt and Taxation which was appointed in March 1924. The majority of the Committee rejected the capital-levy proposal, but showed themselves by no means satisfied with the existing provision for redemption. They recommended that "steps should be taken to increase the Sinking Fund as early as possible to £75 millions a year." They hoped that this would be possible within a period of five years without the imposition of additional taxation, "with the aid of additional allied loan repayments, reductions in the interest charge from conversions and repayments, and possibly expanding revenue. . . ." Nevertheless, "If, on a survey of budgetary prospects, that result is considered to be impossible of achievement, we recommend that additional taxation should be imposed to the extent necessary to raise the Sinking Fund by steps to that figure within, say, five years."[1] The ultimate aim of debt policy, they believed, should be to raise the fund by degrees to £100,000,000 per annum. No reduction of taxation or increase of expenditure should be made which would endanger the carrying out of this programme.

---

[1] Cmd. 2800.

The Committee fully recognized that no safeguard could be devised against the misapplication of the sinking fund. "Hypothecation to particular loans," they declared, "is the greatest safeguard possible, but on other grounds we have decided against any extension of that practice."[2] Probably they were right in thinking that the best policy is to have a fund free to buy up whatever debt can be repaid most cheaply. They appear, however, to have devoted inadequate attention to the principle of a fixed charge. Given the liability of all sinking funds to be raided, the fixed charge seems to possess certain advantages over the fixed fund. The establishment of a fixed charge on any reasonable basis puts the redemption of the debt within sight of a generation now living and to that extent contains a guarantee of its stability. A fixed fund operates so slowly as to create the temptation to carry out a raid upon it. Yet some concession may have to be made to human weakness, and we may have to be content with a partially cumulative sinking fund.[3]

Yet in spite of this insistence upon adequate provision for repayment, it is clear that the general question of debt policy is still an open one. Some provision is generally admitted to be necessary, but there is a good deal of doubt as to whether we should aim at a slow or a rapid repayment. Sums repaid are no doubt reinvested, but attention has been drawn to the possibility that this reinvestment may be realized in gilt-edged securities. A drastic policy of repayment may thus affect the "quality" of capital by increasing the volume of gilt-edged investment at the expense of industrial investment. Similarly it has been argued that such a policy would involve the transference of "potential capital from highly efficient hands to less efficient hands."[1] It is difficult under varying trade conditions to arrive at any precise conclusion as to the direction of this reinvestment, but it seems, in general, probable that a considerable portion of it would be towards industrial securities.

---

[1] Report, § 1001. [2] § 1005.

[3] Cf. Dalton, *Public Finance* (5th Edition), p. 273.

The contrast between different forms of public expenditure provides a wider issue. The probability that additional taxation will be imposed in order to meet the needs of debt redemption has always been remote and is no less remote at the present time. Repayment of debt must then be regarded as a competing form of expenditure, the results of which have to be compared with the results of expenditure on social services or on defence. Here it may well be argued that such stimulus to the growth of material capital as debt repayment may produce is less important than the improvement of the personal qualities of members of the community which would follow from increased expenditure on housing and education.

Nevertheless, under certain circumstances the urgency of redemption could not be ignored. If a considerable fall in the price level, resulting from the operation of purely monetary factors, were to be anticipated, it would clearly be desirable to reduce the debt as speedily as possible. Such a condition prevailed at the close of the war when a strong case existed for the repayment of debt by a levy on capital. The rise in the value of the pound since 1920 has greatly increased the burden of the debt both absolutely and relatively.[2] If the fall in prices is due to an increased output of wealth the answer is not so clear. The absolute burden of the debt charge is increased, but its proportion to the national income is unaltered. In spite of the reduction of debt during the nineteenth century the real value of the debt, it has been pointed out, was actually greater, whether viewed from the standpoint of principal or of interest, in 1914 than it was in 1816.[1] Conversely, a rise of prices either makes it desirable to retard debt repayment or at any rate limits the urgency of such procedure. Considerations of this sort suggest that what is required is not an alteration in debt policy, but the introduction of a new type of Government security, the capital and interest of which would be paid in such sums of money as would always represent the same amount of purchasing power. Mr. Keynes put this proposal before the Colwyn Committee [2] and suggested that a security of this sort would meet the needs of "people who wished to be free from risks arising out of variations in the value of money." From the standpoint of the State such an arrangement would possess the definite advantage that a reduction of debt would be a real as well as a nominal reduction, and would not be liable to be offset by a rise in the value of money. Alternatively, of course, the State may gamble on a fall in the value of money which would reduce the real burden of its obligations. Probably it would only be likely to be successful in this direction if it followed the example of certain Continental Governments and turned the odds in its favour by a deliberate depreciation of the currency. Hitherto it has lost rather than gained by the monetary policy which it has pursued.

---

[1] Colwyn Report, § 977. This and other references are to the Majority Report.

[2] According to a note submitted by the Treasury to the Colwyn Committee (Appendix XXV), out of a total of £4,741,551,000 borrowed during the war (exclusive of foreign debt and floating debt) £1,266,000,000 were raised when the level of prices was lower than the level of October 1925 (164) and £3,475,000,000 when it was higher than that level.

Two other cases of urgency may also be mentioned. First, the possibility of the occurrence of some emergency which might lead to extensive public borrowing cannot be ignored. Unless some progress had by that time been made in the reduction of the debt, loans could only be raised on expensive terms. Secondly, debt policy in the future must be largely concerned with conversion operations. There is indeed a tendency, as we have seen, to overemphasize the influence which the policy of redemption exerts upon the prices of public securities, and to neglect the influence of general factors affecting the rate of interest. Nevertheless, within the particular market special factors do operate, and among these redemption policy is clearly the most important.

Meanwhile the problem of the relationship between debt and taxation has undergone a considerable change since the close of the war. In 1918 and 1919 it seemed probable that the debt charge would be so heavy as to necessitate for some time an income tax of seven or eight shillings in the pound. These fears have fortunately not been realized and taxation has been steadily reduced. The plea for some large scheme of repayment in order to throw off once for all the heavy burden of taxation has therefore to a considerable extent lost its force. Thus the Colwyn Committee declared :

---

[1] Cf. Dalton, *Public Finance* (5th Edition), p. 243. The proportion of the debt charge to the national income was, of course, much lower.

[2] Report, § 1009. Cf. Dalton, *op. cit.*, p. 242.

> "The burden of direct taxation, while we do not wish to belittle it, is less crushing than is frequently represented. . . . In our opinion the present taxation—even in conjunction with the loss of material wealth due to war expenditure, which lies behind the National Debt—is not one of the main causes of industrial difficulty. . . . So far as taxation is concerned, we think that if general conditions improve and times become more prosperous, the burden will be carried with comparative ease."[1]

Taxation does not indeed appear to be so unbearable as to necessitate the drastic operation of cutting out the debt.

A distinction must, however, be drawn between the internal and the external debt.[2] The latter not only necessitates the imposition of taxation to meet the payment of principal and interest, but also represents a clear loss in that goods are exported and services rendered to foreigners for which no return is received. It is not yet clear, however, when the claims of Great Britain are taken into consideration, whether the payment of the external debt will involve any net burden.

At the close of the war the largest of Great Britain's external

---

[1] Report, § 702 : compare also Mr. Layton's analysis of the debt burden in 1818, 1913 and 1923 (§ 676).

	1818 Per cent.	1913 Per cent.	1923 Per cent.
Ratio to National Income of—			
Internal Debt Service—			
Interest and Management . .	7·82	0·74	7·14
Debt Repayment . . .	0·30	0·33	0·75
External Debt Service—			
Interest and Management . .	—	—	0·94
Debt Repayment . . .	—	—	0·30
National Debt	210·00	28·26	202·63

[2] Compare Professor Pigou's distinction between *Exhaustive* and *Transfer* Expenditure (*Study in Public Finance*, Part I, Ch. 3).

obligations was the debt due to the Government of the United States.[1] Against these obligations could be set, however, various sums due from abroad to this country. When Mr. Chamberlain drew up his balance sheet in 1919 he calculated that Britain's external debt amounted to £1,350 millions against which there existed the following external assets :

	£ mn.
Obligations of the Dominions	171
,, ,, Allies	1,568 [2]
Liability of India in respect of 5 per cent. War Loan .	30
Total	1,769

Thus if these sums were taken at their face values it was clear that on balance Great Britain was owed more than she herself owed. Even the most optimistic Chancellor, however, could hardly assume that Great Britain would ultimately recover anything like the full nominal value of what was due to her. The Russian Government, for example, had repudiated the external obligations of its predecessors, nor was it probable that the other Allies would repay their debts in full. It was suggested, however, at this time, that vast sums would be derived from the receipt of German reparations and patriotic opinion supported the view that the enemy should be called upon to pay before British claims were pressed upon the allies.

The problem of the repayment of inter-ally debts was forced into consideration by an Act of Congress of 9th February 1922, creating a World War Foreign Debt Commission.[3] This Commission was instructed to arrange for the settlement of the debts due to the Government of the United States on condition that the date of maturity of any bonds created under such a settlement must not be beyond 1947 and that the rate of interest fixed must not be below 4½ per cent.

---

[1] On 31st March 1919 it was $4,092 millions (142 of 1921).

[2] Distributed as follows :

	£		£
Russia . . .	568,103,000	Belgium . . .	86,779,000
France . . .	434,490,000	Serbia . . .	18,643,000
Italy . . .	412,520,000	Other Allies . .	47,915,000

[3] For the question of inter-ally debts see Moulton and Pasvolsky, *World War Debt Settlements*.

The British Government, faced with the necessity of meeting the claims of its principal creditor, announced its intention of making settlements with its debtors. Its policy was expressed in the Balfour Note of 1st August 1922. That note declared that the British Government was prepared to abandon all further rights to German reparations and all claims to repayment by its Allies, provided that the renunciation formed part of a general plan. But the Government of the United States had with perfect justice demanded that a settlement of the outstanding obligations due to it should be arrived at, and the British Government was accordingly compelled to enter into negotiations for a settlement of sums due to it by its European debtors. Nevertheless it was clearly pointed out that "in no circumstances do we propose to ask more from our debtors than is necessary to pay our creditors." The principle of the Balfour Note may in fact be interpreted as claiming for Great Britain such sums only by way of reparations and inter-ally debt payments as shall in the aggregate be equal to the sums due from her to the Government of the United States.

The Note thus places in the hands of the United States Government the solution of the problem of an all-round cancellation of debts. At the same time it makes Great Britain simply the channel through which payments flow from Europe to America. Provided that the principles of the Note are fully observed, Great Britain stands neither to gain nor to lose from any revision of any of the debt settlements. Hitherto such revisions as have taken place have operated upon German reparation payments in a downward direction, and the problem has been one of securing that the British share of these diminished reparations plus receipts from inter-ally debt payments shall be sufficient to meet British debt payments to the United States.

In January 1923 Mr. Baldwin, at the head of a funding Commission, visited the United States for the purpose of arranging a settlement of British obligations. An agreement was signed on 19th January 1923, fixing the principal of the British debt to the United States Government at $4,604,128,086, which was met by the creation of bonds to the extent of $4,600,000,000, the remainder of the sum due being paid in cash. Under the terms of the agreement the bonds are to be paid off in sixty-two annual instalments, the rate of interest being fixed at 3 per cent. for the first ten years (*i.e.* up to the end of 1932) and at 3½ per cent. afterwards (*i.e.* up to the end of 1984). The repayment operates along the lines of a fixed debt charge. A sinking fund representing at the outset $23,000,000 or ½ per cent. of the total debt grows cumulatively until in the last year it amounts to $175,000,000. The fixed charge is thus $161,000,000 for the first ten years of the agreement and $184,000,000 for the remaining fifty-two.[1]

Four conditions are attached to this agreement which are in the main favourable to Great Britain. First, during the first five years one half of the interest may be deferred and added to the principal. Secondly, payment of interest or principal may be made in any United States Government bonds issued since 6th April 1917, such bonds to be taken at par with accrued interest. Thirdly, Great Britain may on any interest date make advance payments of principal. Fourthly, the United States may call for the delivery of bonds of marketable denominations, but Great Britain may in lieu of issuing such bonds make advanced redemption at par. Of these conditions the third is probably the most important. It enables the British Government by borrowing internally to repay the principal outstanding and thus to convert its external debt into an internal debt. At the moment, however, there seems to be no clear advantage in such a policy, while against it may be set the possibility of a reduction of the debt by some future international agreement.[2]

The experience of other debt settlements since the war has led to criticism of this agreement on the ground that it did not represent the best terms which might have been secured by the British Government. Certainly some of the settlements which have been arranged have not even provided for the repayment of the principal of the debt, no account being taken of interest. Probably the result must be attributed in part at any rate to the fact that the British Government was the first Government to enter into such an agreement. The original terms imposed by Congress were, as Mr. Baldwin pointed out, severe, and would have involved a payment at the rate of 6½ per cent. per annum on the principal of the debt, or something over £61,000,000. The terms which were actually secured were clearly far more favourable and represented a considerable abatement. The Balfour Note, moreover, was to be interpreted in the sense that Great Britain would pass on any concessions she received to her European debtors. No specific importance could therefore be attached to British claims for a reduction of liabilities on external payments.

---

[1] Approximately £33,000,000 and £38,000,000 per annum.

[2] Cf. Colwyn Report, § 92: "Whether or not it may be practicable or desirable . . . to accelerate repayment to the United States Government it is too early yet to foresee. There is obviously a limit to the amount which can be transferred abroad without damaging effects on industry in this country. . . ."

The existence of a large external debt creates an entirely new factor in the financial position of Great Britain. The nearest parallel is to be found perhaps in the eighteenth century when alarm was expressed concerning the tribute which had to be paid to foreign holders of British debt.[1] But the parallel is far from complete. The eighteenth-century debt was due to individuals—the external debt to-day is mainly due to a foreign Government.[2]

Besides being indebted to the Government of the United States, Great Britain also owed sums to the Governments of France, Italy and Russia. But against these obligations she could set much larger claims on account of sums advanced to these European Governments.[3] On 1st April 1925 the chief ally debts to this country were as follows :

	£
Russia	756,704,748
France	620,224,200
Italy	582,510,000

Some progress has been made towards the settlement of these obligations. The Russian debt must indeed be written off but arrangements have been made for the adjustment and settlement of the sums due from France and Italy.

---

[1] *Vide supra*, p. 86.

[2] On 1st April 1925 the total external debt of Great Britain was £1,122 millions. Of this amount 80 per cent. represented debt due to the United States, and of this latter sum more than nine-tenths was owed directly to the U.S. Treasury. Cf. Moulton and Pasvolsky, *op. cit.*, p. 25.

[3] The nominal amount of Great Britain's advances to her allies together with accumulated interest was, 1st April 1925, £2,062 millions. Moulton and Pasvolsky, *op. cit.*, p. 25.

Under an agreement concluded between Great Britain and France, on 12th July 1926 [1] the total payments due from France are fixed at £855 millions, a deduction of £53½ millions, however, being made from this sum on account of gold shipped to London by the Bank of France as security for war loans. The remaining payments are spread out over sixty-two years and rise from £4,000,000 in 1926–7 to £14,000,000 in 1957–8. No distinction is made between the payment of interest and the repayment of principal, but since the French debt at the settlement amounted to £653 millions (including interest accrued) it is clear that the interest which is being paid is less than 1 per cent. on the principal of the obligation.

An agreement was entered into with Italy on 27th January 1926.[2] The total payments due from Italy are fixed at £276,750,000, allowance however being made here as in the case of France for gold shipped to London during the war amounting to £22,200,000. The payments rise from £2,000,000 in the first year to £4,500,000 in the eighth year, but from these annuities instalments representing repayment of the gold will be deducted. No distinction is drawn between interest and principal; the total Italian debt at the time of the agreement, however, was £610,840,000, so that, in fact, no interest is paid and a large part of the principal is written off.

Both these debt settlements are subject to the principle enunciated in the Balfour Note, though this qualification presumably refers only to the possibility of a scaling down of the payments due. Thus, in so far as Great Britain is receiving from her European debtors sufficient annual payments to meet her obligations to the United States, the benefit of any reduction in the payments due from her must be passed on and cannot be retained. A general revision of debts cannot, therefore, directly benefit Great Britain, while a purely European revision might damage her interests by reducing the aggregate payments which she receives below the level of the sums due from her to the United States. This sort of danger was revealed in the proposals of the Dawes Commission; for, while the British debt to the United States is fixed in terms of gold,[1] it was proposed by the Commission that German reparation payments should vary in accordance with changes in the purchasing power of gold.

---

[1] Cf. Moulton and Pasvolsky, *op. cit.*, pp. 30–1.

[2] *Ibid.*, pp. 31–2.

Large though the external debt is, however, the problem of the internal debt dominates the situation. For the reduction of the burden which the charge of this debt represents reliance, it seems, must be mainly placed upon sinking funds and conversion operations. The State has now reverted to the principle of a fixed debt charge which has been fixed at £355,000,000. But in view of the statutory sinking fund requirements and the lack of any provision for interest accrued on Savings Certificates this arrangement cannot be considered to have made any real contribution to a solution of the problem of repayment. In general, however, there is much to be said for the policy of aiming at complete redemption within a period of, say, fifty years, since no plan will probably be consistently carried out which does not hold out the possibility of a cancellation of the debt at a relatively early date. Yet it cannot be expected that even under these conditions the principle of the fixed debt charge will be rigidly adhered to. The savings on conversions of debt will almost certainly be allowed to pass into the pockets of the taxpayer. Nor, apart from such savings, is it probable that Chancellors of the Exchequer will refrain under conditions of growing expenditure from laying hands upon the sinking fund.

The conversion of debt from a higher to a lower rate of interest presents a less difficult problem. There can be no divergence of opinion here on the matter of policy since, given the necessary fall in the rate of interest, it is agreed that it is desirable that debt should be converted where it is possible. It is clearly impossible to make any forecast as to the trend of interest rates in the future and the savings which may be derived from conversions cannot therefore be estimated with any precision.

A tentative estimate can, however, be made by assuming that a certain fall in the rate of interest will occur and that advantage will be taken of this fall to convert any debt which happens to be redeemable. Thus the Colwyn Committee estimated that if conversion to a 4 per cent. basis could be achieved the total annual saving of interest by 1940 would be £33,099,000 : while if a 3½ per cent. basis were taken the annual saving would be (at the same date) £51,089,000. On the other hand, if debt were only converted at the date at which the Government was bound to redeem, the corresponding savings would be postponed until 1948.[1] They also showed that if the year 1934 were taken as a basis of comparison, the annual saving on the former set of hypotheses would be nearly three times as great as that arising on the latter set.

---

[1] A fact often forgotten by those who pointed to the reduction in the money burden of the debt resulting from the return to gold parity with the dollar.

As in the case of the capital levy, however, the gross savings yielded by these operations must be contrasted with the net savings. Some allowance must be made for the loss of income tax and super-tax which will be caused by the reduction in the amount of dividends paid on Government securities. These dividends flow, it is true, from paper wealth, not from real wealth, but they are of course equally taxable with the dividends on industrial securities. The Colwyn Committee pointed out that "assuming the loss in tax is 4*s*. in the £ the net saving in the Budget would be reduced to about £26 millions in the event of conversion to a 4 per cent. basis or to £41 millions on a 3½ per cent. basis. Actually at present rates of income tax and super-tax the loss of revenue is likely to be considerably more."[2] A reduction in the rates of income tax and super-tax would naturally increase the net savings of conversions, and the probability of such a reduction might under certain circumstances make it desirable actually to postpone conversion. A reduction in rates in the future seems, however, highly improbable, and it is therefore clear that the net savings from a lowering of the rate of interest on such portions of the debt as are redeemable within the next ten years would not be considerable.

---

[1] Colwyn Report (§§ 191–6). It is also pointed out that on the assumption of a 4 per cent. basis some increase in charge would be incurred (on the latter hypothesis) on the 3½ per cent. War Loan and 3 per cent. Exchequer Bonds, and on the Exchequer Bonds on the assumption of a 3½ per cent. basis ; no allowance was made, moreover, for the possibility of conversion of 5 and 4 per cent. War Bonds into 5 and 4 per cent. War Loans.

[2] Report, § 196.

If changes in the rate of interest be excluded three general considerations still remain. The burden of the debt may be affected by changes in numbers, changes in wealth per head and changes in the general level of prices. Here there is good ground for the view that within a few years the increase of population which has been experienced in the past will be arrested. We are therefore deprived of the influence of one of the most important factors which brought about a decline in the debt burden during the nineteenth century—the growth of numbers. Concerning changes in *per capita* wealth and in the level of prices it would be futile to prophesy. But genuine alleviation can only come from a rise of prices following from monetary causes, and we cannot be far wrong in supposing that such a rise of prices is improbable unless another war breaks out and inflation is again employed. Under these circumstances it is clear that reliance cannot be placed upon the operation of general economic factors. So far, therefore, as a reduction of the burden of debt is regarded as a problem to be solved, the solution must come from a deliberate financial policy consistently and resolutely pursued.

TABLES

TABLE A

The Debt and Debt Charge

	National Debt £	Debt Charge £
1697	14,522,925	1,232,519
1702	12,767,225	1,215,324
1714	36,175,460	3,063,135
1739	46,391,421	2,044,104
1748	75,448,809	3,149,661
1757	77,817,182	2,735,925
1763	132,120,664	5,008,918
1776	130,451,006	4,814,714
1781	187,756,281	7,343,949
1786	243,206,140	9,525,038
1793	244,720,976	9,534,738
1802	523,274,057	19,481,252
1815	834,262,726	31,414,145
1828	800,032,289	29,167,877
1853	812,163,554	27,597,645
1860	821,670,869	26,024,657
1880	769,856,044	29,575,264
1902	745,015,650	27,282,058
1914	649,770,091	22,668,896
1920	7,831,744,300	349,598,615
1925	7,646,371,788	358,229,246

Notes.—(*a*) Down to 1828 the figures are those of *Public Income and Expenditure* 1868–9, XXXV. They refer to the *unredeemed* capitals of the debt, and no allowance is made for the capital value of the Terminable Annuities. (*b*) Down to 1815 the figures refer to Great Britain; those for 1828 and subsequent years refer to the United Kingdom. (*c*) The "other capital liabilities" are not included.

TABLE B

NATIONAL DEBT, DEBT CHARGE, NATIONAL INCOME, POPULATION AND INDEX OF PRICES

Date	National Income £ mn.	National Debt £ mn.	Debt Charge £ mn.	Population mn.	Income per head £ s.	Approximate Debt Charge per head £ s. d.	Index of Prices (Jevons-Sauerbeck)
1818 .	400	840	32·50	17	23 11	1 18 0	160
1864 .	814	816	28·96	29·7	27 8	0 19 0	105
1875 .	1,200	766	27·44	33	36 7	0 16 6	96
1891 .	1,600	682	25·26	38	42 2	0 13 3	72
1913 .	2,300	656	24·50	45·9	50 2	0 10 6	85
1924 .	4,164	7,681	357·16	44·9	92 15	7 19 1	139

The figures for the years 1818, 1864, 1875, 1891 and 1913 are reproduced from the Colwyn Report (§ 679); those for the year 1924 are based on *The National Income*, 1924, by Bowley and Stamp.

TABLE C

THE COMPOSITION OF THE DEBT, 1727, 1831, 1926

The Publick Debts due or standing out at Christmas, 1727.[1]

	Principal			Interest		
Exchequer :	£	s.	d.	£	s.	d.
Annuities for Long Terms .	—			131,458	12	8
Annuities for Lives with Benefit of Survivorship .	—			7,567	0	0
Annuities payable upon Two or Three Lives .	—			17,527	8	9
Short Annuities at 9 per cent.	—			14,499	15	0
Short Annuities on Lottery, 1710	—			9,836	2	0
Annuities on Army Debentures at 4 per cent. .	218,165	16	4¾	8,726	12	7¾
Annuities for Nevis and St. Christopher's Debentures at 3 per cent. .	68,534	1	1¼	2,056	0	5
Exchequer Bills on the Victualler's Act, 1726, at 3 per cent. . . .	486,600	0	0	14,598	0	0
Exchequer Bills on the Surplus of the Duty on Coals	338,800	0	0	10,164	0	0
Exchequer Bills for the interest on the old Bills exchanged . . .	2,200	0	0	—		
Loans on the Duty on Coals at 4 per cent. .	90,000	0	0	3,600	0	0
East India Company at 5 per cent.	3,200,000	0	0	160,000	0	0
Bank of England :						
Original fund at 6 per cent.	1,600,000	0	0	96,000	0	0
For cancelling Exchequer Bills at 4 per cent. .	1,775,027	17	10½	71,001	2	3¼
For cancelling Exchequer Bills at 4 per cent. .	2,000,000	0	0	80,000	0	0
The Sum purchased by them of the South Sea Company at 4 per cent..	4,000,000	0	0	160,000	0	0
South Sea Company :						
Capital Stock and Annuities at 4 per cent. .	33,802,203	5	6½	1,352,086	2	7¾
	£47,581,531	0	11	£2,139,122	16	4¾

---

[1] *Commons Journal,* xxi, 100.

An Account of the State of the Public Debt, 5th January 1831.

	£	*s.*	*d.*
Debt due to the South Sea Company at 3 per cent.	3,662,784	8	7
Old South Sea Annuities	3,501,870	2	7
New South Sea Annuities	2,489,830	2	10
South Sea Annuities, 1751	527,100	0	0
Debt due to the Bank of England	14,686,800	0	0
Bank Annuities created in 1726	876,049	19	0
Consolidated Annuities	348,828,660	15	6
Reduced Annuities	123,771,890	19	2
Total at 3 per cent.	498,344,986	7	8
Annuities at 3½ per cent., 1818	12,804,559	2	2
Reduced Annuities at 3½ per cent.	64,250,381	1	11
New 3½ per cent. Annuities	138,680,967	5	3
4 per cent. Annuities, 1826	10,806,966	0	0
New 5 per cent. Annuities	467,712	19	11
Total Funded Debt	725,355,572	16	11
Unfunded Debt:			
Exchequer Bills	27,278,400	0	0
Sums remaining unpaid charged upon Aids granted by Parliament	4,543,328	0	6
Advances made out of the Consolidated Fund in Ireland towards supplies	257,755	6	0
Total Unfunded Debt and Demands outstanding	32,079,483	6	6
Total Debt	£757,435,056	3	5

The National Debt, 31*st March* 1926.

	£
Funded Debt :	
2½ per cent. Consols	276,329,287
2¾ per cent. Annuities	2,399,679
2½ per cent. Annuities	21,130,357
3½ per cent. Conversion Loan	760,015,376
Debts due to the Banks of England and Ireland (2½ per cent.)	13,645,869
Total Funded Debt	1,073,520,568
Estimated Capital Liability in respect of Terminable Annuities	12,639,540
Unfunded Debt :	
Treasury Bills	564,855,000
Ways and Means Advances	139,441,000
3½ per cent. War Loan	62,713,997
4½ per cent. War Loan	12,804,441
5 per cent. War Loan	2,044,052,512
4 per cent. War Loan	64,914,955
4 per cent. Funding Loan	391,909,485
4½ per cent. Conversion Loan	210,586,966
4 per cent. Victory Bonds	347,609,045
3 per cent. Exchequer Bonds, 1930	15,640,000
National War Bonds	705,699,695
Treasury Bonds	481,431,572
National Savings Certificates	375,575,390
Other Debt	1,753,250
Total Unfunded Debt	5,418,987,308
Total Internal Debt	6,505,147,416
External Debt	1,110,768,333
Total Debt	£7,615,915,749

BIBLIOGRAPHY

Acworth, A. W.: Financial Reconstruction in England, 1815–22 (1925).

Anderson, A.: An Historical and Chronological Deduction of the Origin of Commerce (1764).

Adams, H. C.: Public Debts (1887).

Asgill, J.: An Abstract of the Publick Funds (1715).

Baxter, R. D.: National Debts (1871).

Barbier, S.: An Expedient to Pay the Publick Debts (1719).

Buxton, S. C.: Finance and Politics (1888).

Bastable, C. F.: Public Finance (1st Edit., 1892).

Brisco, N. A.: The Economic Policy of Robert Walpole (1907).

Barnard, Sir J.: Considerations upon a Proposal for lowering the Interest of all the Redeemable National Debts to three per cent. (1737).

Reasons for the Representatives of the People of Great Britain to take Advantage of the Present Rate of Interest for the more speedy lessening the National Debt (1737).

Cobbett, W.: Paper against Gold (1815).

Noble Nonsense (1828).

Cohn, G.: System der Finanzwissenschaft (1889); translated by T. Veblen as The Science of Finance (1895).

Dalton, H.: Public Finance (1923).

The Capital Levy Explained (1923).

Decker, Sir M.: Serious Considerations of the several High Duties which the Nation in general labours under (1743).

Davenant, C.: Discourses on the Publick Revenues and on the Trade of England (1698).

Dowell, S.: A History of Taxation and Taxes in England (1884).

Fairman, W.: An Account of the Public Funds, transferable at the Bank of England, also a History of the National Debt and Sinking Fund (7th Edit., 1824).

Gordon, G.: The History of our National Debts and Taxes (1751).

Giffen, Sir R.: Essays in Finance, First Series (1886).

Grellier, J. J.: The History of the National Debt (1810).

Gould, Sir N.: An Essay on the Publick Debts of this Kingdom (1726).

A Defence of an Essay on the Publick Debts of this Kingdom (1727).

Grenville, Lord W.: Essay on the Supposed Advantages of a Sinking Fund (1828).

Hume, D.: Essays Moral, Political and Literary (1752).

HOOKE, A.: An Essay on the National Debt and National Capital (1750).

HIRST and ALLEN: British War Budgets (1926).

HAMILTON, Sir E. W.: Conversion and Redemption (1889).

HAMILTON, R.: An Inquiry concerning the Rise and Progress, the Redemption and Management of the National Debt of Great Britain (1st Edit., 1813).

HEATHFIELD, R.: Elements of a Plan for the Liquidation of the Public Debt of the United Kingdom (1819).

HUTCHESON, A.: Some Calculations and Remarks relating to the Present State of the Publick Debts and Funds, and a Proposal for the entire discharge of the National Debt and Incumbrance in thirty years' time (1718).

Some Considerations relating to the Payment of the Publick Debts (1720).

A Collection of Treatises relating to the National Debts and Funds (1721).

KIRKALDY, A. W.: British Finance, 1914–21 (1921).

LAWRENCE, F. W. P.: A Levy on Capital (1918).

The National Debt (1924).

MCCULLOCH, J. R.: An Essay on the Question of Reducing the Interest of the National Debt (1816).

A Treatise on the Principles and Practical Influence of Taxation and the Funding System (1845).

A Select Collection of Treatises on the National Debt and the Sinking Fund (1857).

MALLET, Sir B.: British Budgets, 1887–1913 (1913).

MALLET and GEORGE: British Budgets, 1913–21 (1929).

MACKWORTH, Sir H.: A Proposal for Payment of the Publick Debts (1720).

MORGAN, W.: A Review of Dr. Price's Writings on the Subject of the Finances of this Kingdom (1792).

Memoirs of the Life of the Rev. Richard Price (1815).

MOULTON and PASVOLSKY: World War Debt Settlements (1927).

NEWMARCH, W.: On the Loans raised by Mr. Pitt during the First French War, 1793–1801 (1855).

NORTHCOTE, S. H.: Twenty Years of Financial Policy (1862).

PARNELL, Sir H.: Financial Reform (1830).

PIGOU, A. C.: The Political Economy of War (1921).

A Capital Levy and a Levy on War Wealth (1920).

PRICE, Dr. R.: Observations on Reversionary Payments (1st Edit., 1771).

Appeal to the Public on the Subject of the National Debt (1st Edit., 1772).

Additional Observations on the Nature and Value of Civil Liberty (1777).

The State of the Public Debts (1783).

Postscript to the State of the Public Debts (1784).

Phillipovich, E. Von : Die Bank von England im Dienste der Finanzverwaltung des Staates (1885), translated by C. Meredith as The History of the Bank of England and its Financial Services to the State (1911).

Postlethwayt, J. : The History of the Public Revenue (1751).

Postlethwayt, M. : The Universal Dictionary of Trade and Commerce (4th Edit., 1774).

Great Britain's True System (1757).

Pulteney, W., Earl of Bath : A State of the National Debt (1727).

Pulteney, W. : Considerations on the Present State of Publick Affairs (1779).

Rees, J. F. : A Short Fiscal and Financial History of England, 1815–1918 (1921).

Ricardo, D. : Principles of Political Economy and Taxation (1817).

Essay on the Funding System (1820).

Smith, A. : The Wealth of Nations (1776).

Sinclair, Sir J. : The History of the Public Revenue of the British Empire (1785–9).

Sargant, W. L. : An Apology for Sinking Funds (1868).

Shaw, W. A. : The Beginnings of the National Debt (1902).

Steuart, Sir J. : An Inquiry into the Principles of Political Economy (1767).

Shirras, G. F. : The Science of Public Finance (1925).

Stanhope, Lord C. : Observations on Mr. Pitt's Plan for the Reduction of the National Debt (1786).

Wallace, R. : Characteristics of the Present Political State of Great Britain (1758).

Young, A. : Political Arithmetic (1779).

An Enquiry into the Conduct of our Domestic Affairs (1734).
The Case of the Sinking Fund (1735).
Some Considerations concerning the Publick Funds (1735).

PARLIAMENTARY PAPERS

(1) 1857–8, XXXIII, pp. 248 *et seq.* : Notices of the various forms of the Public Debt, its Origin and Progress.
(2) 1868–9, XXXV : Public Income and Expenditure.
(3) 1890–1, XLVIII, pp. 511–839 : Report of the Proceedings of the Commissioners for the Reduction of the National Debt from 1786 to 1890.
(4) 1898, LII, pp. 269–348 : History of the Earlier Years of the Funded Debt from 1694 to 1786.
(5) 1927, XI, pp. 371 *et seq.* : Report of the Committee on National Debt and Taxation.

INDEX

Acland, Mr. (now Sir) F. D., 267 note
Addington, 123, 126
Addison, 5
Althorp, Lord, 157, 161
Anderson, A., 23 note
Arnold, Mr. (now Lord), 264–6, 267, 268 note
Asquith, H. H., 219, 221–2, 224, 273, 277

Baldwin, Mr. S., 274–5, 276–8
Balfour Note, 284, 286, 287
Banbury, Sir F. (now Lord), 216 note, 234 note, 235
Bank of England, 7, 8–10, 13, 17, 18, 20, 23, 24, 27, 28, 30, 39, 40, 52, 53, 54, 56, 57, 58–9, 118–9, 233
Barbier, S., 38 note
Baring, A., 147, 157
Barnard, Sir J., 44, 47–9, 51
Baxter, R. D., 167, 184 note
Blackett, Mr. (now Sir) B., 268
Blackstone, 76–7
Bolingbroke, 5
Bradbury, Lord, 255
Buxton, S., 219

Capital Levy, 32–5, 139–41, 243, 263–70, 278
Capital Liabilities, 220–1
Chamberlain, Mr. (now Sir) A., 219, 220, 249, 252, 254, 256, 261, 267, 269, 271, 283
Chancery Stock, 191, 212
Charles II, 2, 3, 4
Childers, H. C., 191–3, 209
Chiozza Money, Sir L., 227
Cobbett, W., 136, 137, 145
Colwyn Committee, 259, 273, 278–80, 281, 282, 285 note, 289
Consols, 56–7, 70, 106, 113, 208, 209, 210, 211, 212, 213, 215, 217–18, 223–5, 229, 234, 258–9, 260
Conversion of Debt, (1715) 22–4, 43, 47–52; (1749) 53–6; 65, 92, 95–6, 101–2, 113–14, 132; (1822–4) 155–6; (1830–34–44) 160–2; (1853) 162–4; (1884) 209–10; (1888–9) 210–4; 257, 259–60, 288–90
Conversion Loans, (1921) 256–8, 259, 272, 274 note; (1924) 258, 260; (1929) 259

Dalton, Dr. H., 231 note, 269 note, 279 note, 281 note
Davenant, C., 13–16
Dead-weight Annuity, 147–8, 153, 175, 178
Decker, Sir M., 74, 81–2
Disraeli, B., 171, 182, 188

East India Company, 10, 17, 20, 23, 24 note, 27, 52, 53, 58
Exchequer Bills, 3, 9, 11–12, 17–19, 24, 29, 128, 131, 132, 133, 161 note, 163, 164, 206
Exchequer Bonds, 162, 163, 169–70, 171, 173, 189, 190, 205, 206, 207, 213, 215–16, 217, 219, 220 note, 227, 231, 236–7, 240, 243, 253 note, 255, 258, 265, 289 note

Farrer, Sir T. H., 195
Fawcett, H., 204
Floating Debt, 3, 9, 11, 12, 18, 19, 29, 37, 65, 104, 117–18, 128, 131,

132, 163, 216, 219, 221, 225 note, 231, 233, 237, 238–9, 241, 243, 247, 251, 252, 254–5, 268
Fox, 69, 101
Fox's Clause, 104, 137
Funding Loan, 249–51, 253, 272, 274 note, 277

George, Mr. D. Lloyd, 222, 223, 224, 226, 229, 232, 233, 261
Giffen, Sir R., 183
Gladstone, W. E., 120, 162–4, 168–9, 170, 171, 172, 173, 175–7, 179–82, 188, 191, 219
Goschen, G. J., 193–5, 199, 200, 207, 208–10, 219
Goulburn, H., 153, 161–2
Gould, Sir N., 41–44, 91
Grenfell, P., 130, 133, 137
Grenville, Lord W., 150–1, 177

Hamilton, Sir E. W., 209 note, 210
Hamilton, R., 98, 135–6
Harcourt, Sir W., 193, 219, 226 note
Heathfield, R., 139–41
Henry, Sir C., 238, 240
Hicks-Beach, Sir M., 195–7, 215–16, 219
Hilton-Young, Commander (now Sir) E., 276
Holden, Sir E., 225
Hooke, A., 78–9
Horne, Sir R., 250 note, 273, 275
Hume, D., 74–6, 77, 79, 83, 85
Hume, J., 149–50
Huskisson, W., 130
Hutcheson, A., 31–6

Income Tax, 38, 108, 120, 123, 124, 126, 131, 132, 156, 160, 168, 169, 170 note, 171, 172, 173, 177, 181, 183, 188, 189, 194, 200, 225, 232, 241, 263, 265, 270, 273, 275, 282, 289

Jevons, W. S., 175

Keynes, Mr. J. M., 281

Land Tax, 24 note, 32, 44, 117
Law, A. Bonar, 241–2, 245–6, 248, 249, 261, 264
Lawrence, Mr. F. W. P., 266
Lewis, Sir G. C., 170–1, 172, 173
Life Annuities, 6, 7, 8, 23, 133, 155, 158, 177
Local Loans, 206–09
Long Annuities, 8, 16, 62, 63, 115, 116, 173, 175
Lotteries, 5, 8, 16, 17, 52, 62–3, 66–7
Lowe, J., 150
Loyalty Loan, 115–17

Mackworth, Sir H., 36–7
Malthus, T. R., 144–5
Marriott, Mr. (now Sir) J., 270
McCulloch, J. R., 22 note, 142–3, 145, 160, 167
McKenna, Mr. R., 233–5, 238–40, 247
Mill, J. S., 166–7
Mitchell Thompson, Mr. (now Sir) W., 227
Mond, Sir A. (now Lord Melchett), 275–6
Mushet, R., 143–4

National Debt Commissioners, 100, 101, 102, 103, 104, 105, 106, 109, 110, 117, 123, 127, 128, 133, 137, 138, 148–9, 152, 155, 156, 158–9, 160, 161, 178, 182, 183, 186 note, 187, 191, 196, 200, 205 note, 206, 207, 210, 212–13, 272
Navy Bills (Debt), 20 note, 65, 104, 117–18
Newmarch, W., 112–14, 121, 170
North, Lord, 67–71, 94 note, 96
Northcote, S., 184–190, 206, 216 note

Paterson, W., 22–3
Pelham, H., 54, 56
Petty, Lord Henry, 124–26

Pitt, W., 99–101, 103–4, 107, 108, 111–12, 114–21, 126
Postlethwayt, M., 1 note, 82, 86, 91
Premium Bonds, 252
Price, R., 91–99, 101, 106, 187
Pulteney, W., Earl of Bath, 44, 45–6
Pulteney, W. W., 81, 82

Reduced Threes, 56, 58, 63, 66, 70, 106, 109, 113, 115, 116, 117, 121, 122, 128, 132, 162, 164, 210, 211–13
Rees, Mr. J. F., 261
Ricardo, D., 138–9, 141, 147, 150, 165 note, 267 note
Ritchie, C. T., 216–18
Robinson, J. F., 148
Rothschilds, 171 note, 205

Sargant, W. L., 177 note, 183
Savings Certificates, 244, 248, 273, 288
Sinclair, Sir J., 73, 83–5, 86–7, 88, 102, 106, 115 note, 201
Sinking Fund, (1715) 22–6, 39–46, 55, 64, 65, 68–9, 76, 89 ; (1786) Ch. VI., 108, 109, 110–1, 123, 124, 125, 126–30, 133, 135–9, 146, 148–55, 157, 172, 187, 201 ; 158, 159, 164–6, 170, 176, 177 note, 182, 183 ; (1875) 184–9, 192, 193, 194–8, 216, 218, 219, 224, 225 note, 225–9, 232 ; 241, 242, 249, 250, 271–3 ; (1923) 274–8 ; (1928) 278, 279, 285, 288
Smith, Adam, 1, 2 note, 6, 7 note, 46, 74, 76, 88, 89, 203, 204
Snowden, Mr. P., 263 note, 264
South Sea Company, 17, 19–20, 23, 24, 27–30, 39, 40, 57
Stamp, Dr. (now Sir) J. C., 266
Stanhope, James, 1st Earl, 22, 24
Stanhope, Charles, 3rd Earl, 101–2, 103 note, 105
Steuart, Sir J., 79–81, 85
Suez Canal, 205
Swift, 4, 5

Tallies, 2–3, 11, 13, 15, 18, 19
Telegraphs, 204
Terminable Annuities, 17, 23, 26, 27, 36, 79, 92, 158–160, Ch. XI, 221, 225
Tierney, G., 129
Tontine, 5, 6
Treasury Bills, 118, 206, 215, 216, 217, 231, 232, 233, 237–41, 246–7, 251, 252, 253, 254, 255
Treasury Bonds, 248, 253, 254, 255, 257, 258, 259, 260, 269
Treasury Orders, 2–3, 11

Vansittart, N., 127–133, 136, 137, 146, 147, 148
Victory Bonds, 249–51, 260, 272, 274 note, 277
Vincent, Sir E., 220

Wallace, R., 77–8, 203
Walpole, Sir R., 22, 23, 44–5, 49–51
War Bonds, 231, 247–8, 249, 251, 255, 256–7, 258, 259, 260, 265, 277, 289 note
War Loans, (1914—3½ p.c.) 232–3, 234, 235, 289 note ; (1915—4½ p.c.) 234–6, 242, 243, 251 ; (1917—5 p.c.) 241–4, 258, 259, 260, 265, 272, 274 note, 275, 278, 289 note
Ways and Means Advances, 231 239, 248, 251, 252–3, 255
Worthington Evans, Sir L., 276
Wyndham, Sir W., 45

Young, Arthur, 81, 82